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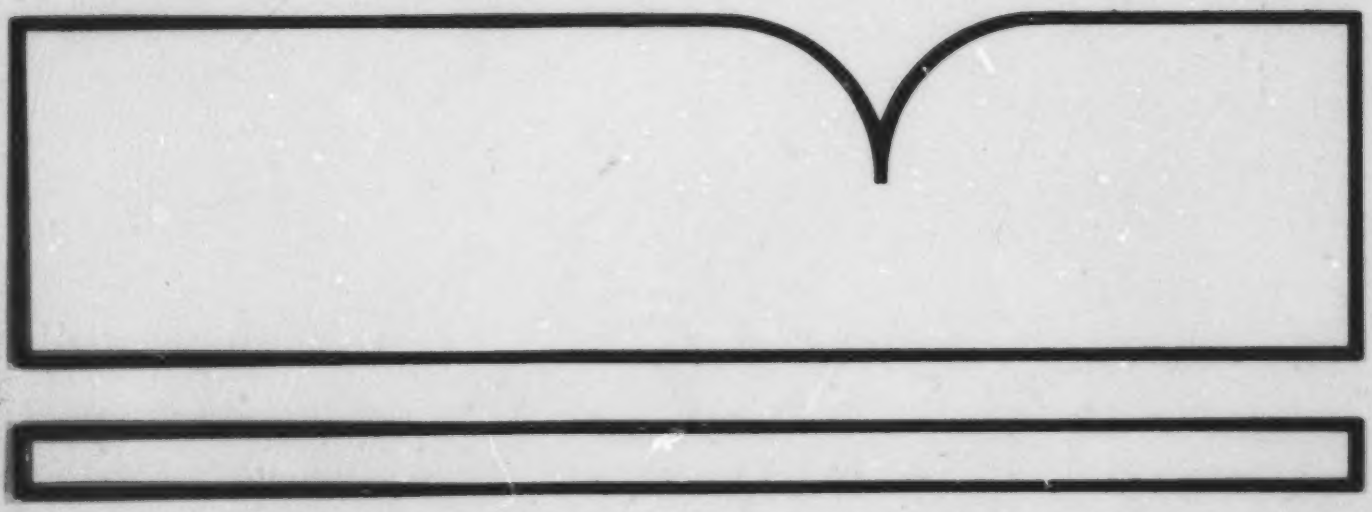
PB84-219203

Effects of Test Vehicle Mileage on Corporate Average Fuel Economy Calculations

(U.S.) Environmental Protection Agency
Ann Arbor, MI

Nov 83



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16. ABSTRACT

The purpose of this report is to estimate the annual corporate average fuel economy (CAFE) credit manufacturers obtain by testing motor vehicles at greater than 4,000 miles accumulation.

17. KEY WORDS AND DOCUMENT ANALYSIS

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EPA Report No.:
EPA-AA-CPSB-83-04

Technical Report

The Effects of Test Vehicle Mileage on Corporate Average Fuel Economy Calculations

November, 1983

NOTICE

This is a technical support report for regulatory action and it does not necessarily represent the final EPA decision on regulatory issues. They are intended to present a technical analysis of issues and recommendations resulting from the assumptions and constraints of that analysis. Agency policy constraints or data received subsequent to the date of release of this report may alter the recommendations reached. Readers are cautioned to seek the latest analysis from EPA before using the information contained herein.

U. S. Environmental Protection Agency
Office of Air, Noise, and Radiation
Office of Mobile Sources
Certification Division
Certification Policy and Support Branch
2565 Plymouth Road
Ann Arbor, Michigan 48105

I. Purpose

The purpose of this analysis is to estimate the annual CAFE credit manufacturers obtain by testing vehicles at greater than 4,000 miles accumulation.

II. Background

A. A vehicle's fuel economy performance usually improves with mileage accumulation due to the gradual reduction in friction between various drivetrain parts. This improvement is most rapid during the initial "break-in" period of the vehicle (the first few thousand miles) and gradually levels off at higher mileages (twenty thousand to thirty thousand miles) before eventually declining in fuel economy at very high mileages due to losses in engine efficiency.

B. In 1975, Congress passed the Energy Policy and Conservation Act (EPCA) which mandated a 100 percent improvement in vehicle fuel economy by 1985. The baseline used for this improvement standard was the EPA fuel economy data base using the 1975 test procedures. This data base consisted of emission test vehicles that were required to be at 4,000 miles, ± 250 miles. Thus, any general increase in average CAFE test vehicle mileages over 4,000 miles will result in CAFE benefits due only to test vehicle mileage effects.

C. Data from several different types of test vehicles go into the CAFE calculation. These vehicle types along with their mileage restrictions are as follows:

1. Certification emission-data vehicles:

These are test vehicles used to demonstrate compliance with emission standards to obtain initial certification. Prior to the issuance of certification cost reduction regulations on October 13, 1981, emission-data vehicles were required to have 4,000 miles (± 250 miles) accumulated at the time of testing. The new regulations now allow emission-data vehicles to have accumulated any mileage, as long as it is greater than a minimum mileage for vehicle stabilization, established by the manufacturer. However, if an emission-data vehicle accumulates more than 6,200 miles, the fuel economy results must be factored back to the 4,000-mile baseline.

2. Certification running change vehicles:

These are treated the same as emission-data vehicles, but are used to demonstrate compliance for design changes made after original certification. There has generally been no mileage limitations on these vehicles, except that they be stabilized. However, historically, running change test vehicles averaged 4,000 miles. Unlike emission-data vehicles, data from running change vehicles are not factored for mileage accumulation over 6,200 miles.

3. Fuel economy data vehicles:

These are vehicles used specifically for generating fuel economy data. These vehicles may, for example, have originally been emission-data vehicles, running change vehicles, or development vehicles. These too must be stabilized, but there is an upper limit of 10,000 miles accumulation. EPA allows up to 10,000 miles on FEDV's so that manufacturers can make increased use of the vehicles by repeated reconfiguration and retesting. In providing this greater test mileage flexibility, EPA did not intend nor expect that the fuel economy data would become biased so as to decrease the representativeness of label values or the stringency of the fuel economy standards.

D. To the extent that manufacturers now use test vehicles for fuel economy testing that have accumulated greater than 4,000 miles, their CAFE's will be higher than they would have been if the 4,000 miles had been adhered to since 1975. This increase is not due to design improvements that are reflected in actual in-use reductions in fuel consumption. Therefore, manufacturers may be getting false credit in their CAFE's due to a technical loophole.

E. Average FEDV mileages have increased since 1975. For all manufacturers, the average FEDV mileage was 4,900 for the 1983 model year (non-sales weighted), and peaked at 5,500 miles in the 1980 model year. Although this does not appear to be a significant increase over the 4,000-mile 1975 baseline, there was a wide variance in the test mileages for each model year (standard deviations of 950 miles to 1,600 miles). A significant amount of tests were conducted at mileages much greater than the average. Since CAFE is a sales-weighted average, the CAFE benefit from high-mileage test vehicles depends upon the sales representation of the test vehicle as well as the mileage. This report quantifies that benefit.

III. Data Analysis

A. General Methodology

The basic approach used to quantify the CAFE credit attributable only to test vehicle mileage was to adjust test results generated at over 4,250 miles to the 4,000-mile level and evaluate new CAFE's. These were then subtracted from the original CAFE's to obtain the mileage credit for each manufacturer and each CAFE class.

The equation used to factor test results to the 4,000-mile level was developed as part of a proposed fuel economy rulemaking (FR 26698, June 9, 1983), in which EPA proposed the equation to adjust test values generated from vehicles at over 6,200 miles, for labeling purposes only. This same equation was implemented in the October 13, 1981 rulemaking, applying it to emission-data vehicles at over 6,200 miles (FR 50498, October 13, 1981). The equation is as follows:

$$FE_{4,000m} = FE_T \, [0.969 + 0.842 \times 10^{-5} \, (m)]^{-1}$$

Where: $FE_{4,000m}$ = Fuel economy data adjusted to 4,000-mile test point

FE_T = Tested fuel economy value

The equation was derived by examining mileage effects on fuel economy within the fuel economy and certification data base for the 1977 through the 1981 model years. A detailed report on this derivation is attached and is titled, "The Effect of Vehicle Mileage Accumulation on Tested Fuel Economy."

For each CAFE category, individual test results that went into the original CAFE calculation were factored (adjusted to the estimated level at 4,000 miles) if the vehicle that generated the results had accumulated more than 4,250 miles. The CAFE was then recalculated with the adjusted test results using the same sales distribution as the original CAFE calculation. The fuel economy "mileage credit" is the original CAFE value minus the adjusted CAFE value, for each model year, manufacturer, and CAFE category.

Summary statistics were also derived for average test vehicle mileages in order to illustrate trends in mileage accumulation. These are illustrated in Figures 1 through 3.

B. Data Base Used

CAFE recalculations were performed for the 1979 through 1982 model years.[1] The 1981 model year was the last model year for which we had a complete CAFE data base at the time of the analysis. The 1982 model year was partially incomplete, missing final CAFE data for AMC and Chrysler. In order to reduce the complexity of the analysis, only the top ten sales manufacturers' CAFE's were examined. They account for approximately 95 percent of U. S. sales. These manufacturers are American Motors, Chrysler, Ford, General Motors, Honda, Nissan, Toyo Kogyo, Toyota, Volkswagen, and Fuji. Separate CAFE standards apply to the categories of passenger automobiles, 2-wheel-drive trucks, and 4-wheel-drive trucks. Therefore, those categories were examined for each of the ten manufacturers.

For the mileage accumulation trend analysis, data were available for the 1976 through the 1983 model years. This data base consisted of all passing valid tests used to support certification, fuel economy labeling, and CAFE's. The vehicles generating the data were emission-data vehicles, fuel economy data vehicles, and running change vehicles. This amounted to about 33,000 data points.

IV. Results

A. Mileage Accumulation Trends

Figures 1 and 2 illustrate average test vehicle mileages for the 1976 through the 1983 model years. As can be seen from the overall trend line, the average mileage of vehicles when tested has generally increased over these years. Although the average test mileage for these years was only approximately 4,500 miles (only a 500-mile increase over the 1975 baseline), nearly 20 percent of the test mileages were in the 5,000- to 10,000-mile range. The impact of these higher mileage vehicles is not necessarily indicated by their proportion in the total population. Their impact on CAFE is

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1. CAFE standards went into effect in the 1978 model year; however, EPA records for that year are not readily accessible and may not be analytically compatible with subsequent model years.

Figure 1

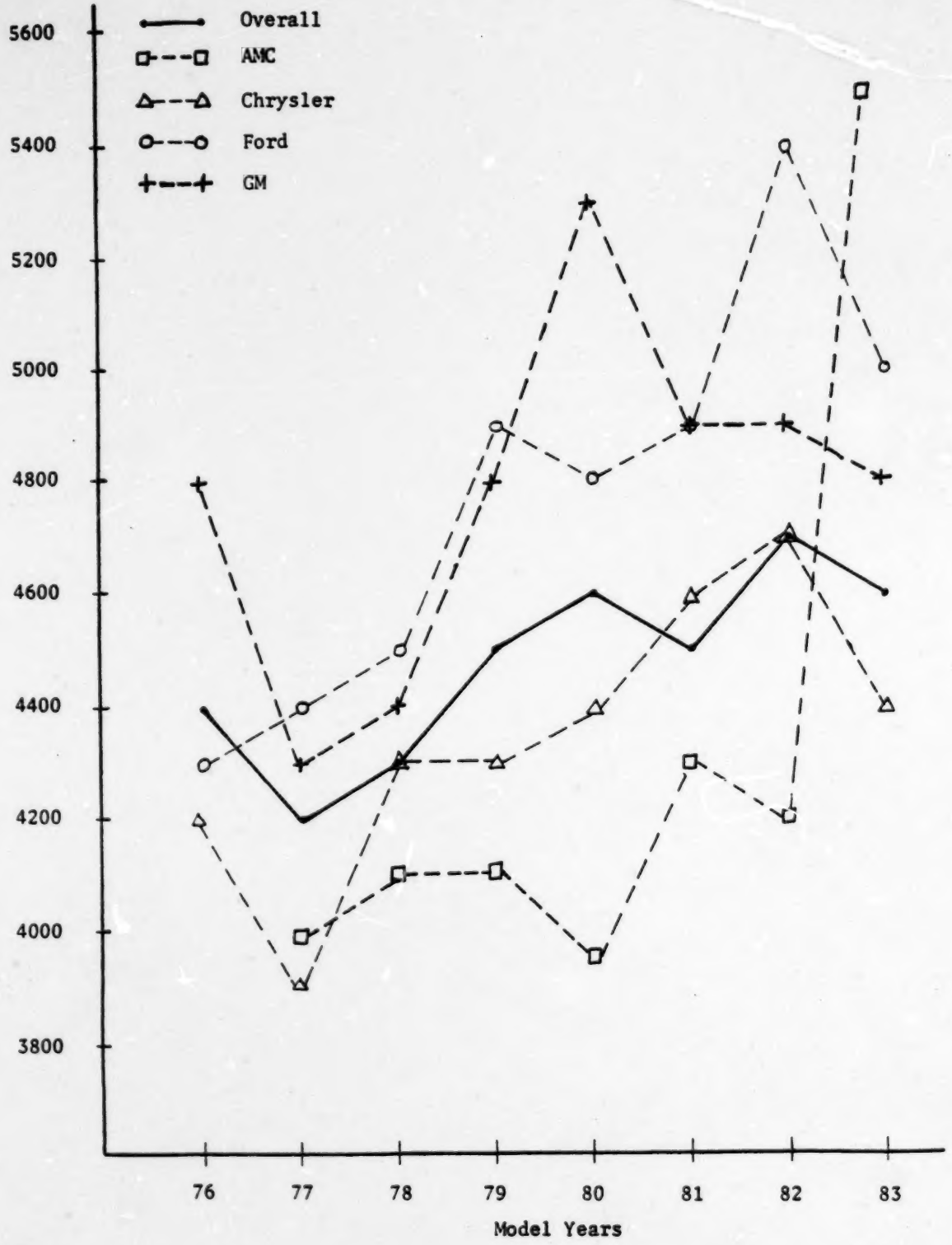
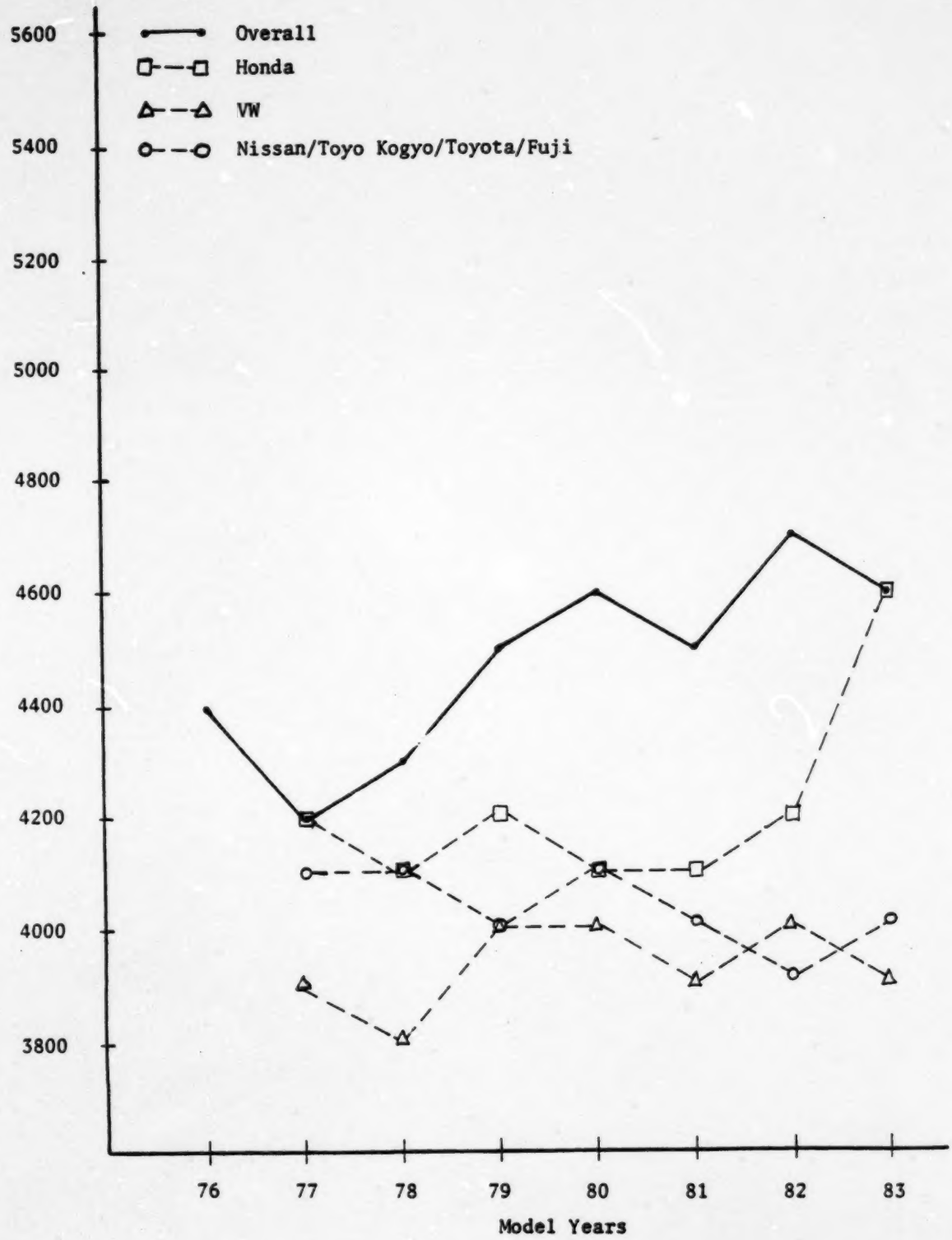

Overall
AMC
Chrysler
Ford
GM
5600
5400
5200
5000
4800
4600
4400
4200
4000
3800
76
77
78
79
80
81
82
83
Model Years

Figure 2


Overall
Honda
VW
Nissan/Toyo Kogyo/Toyota/Fuji
5600
5400
5200
5000
4800
4600
4400
4200
4000
3800
76
77
78
79
80
81
82
83
Model Years

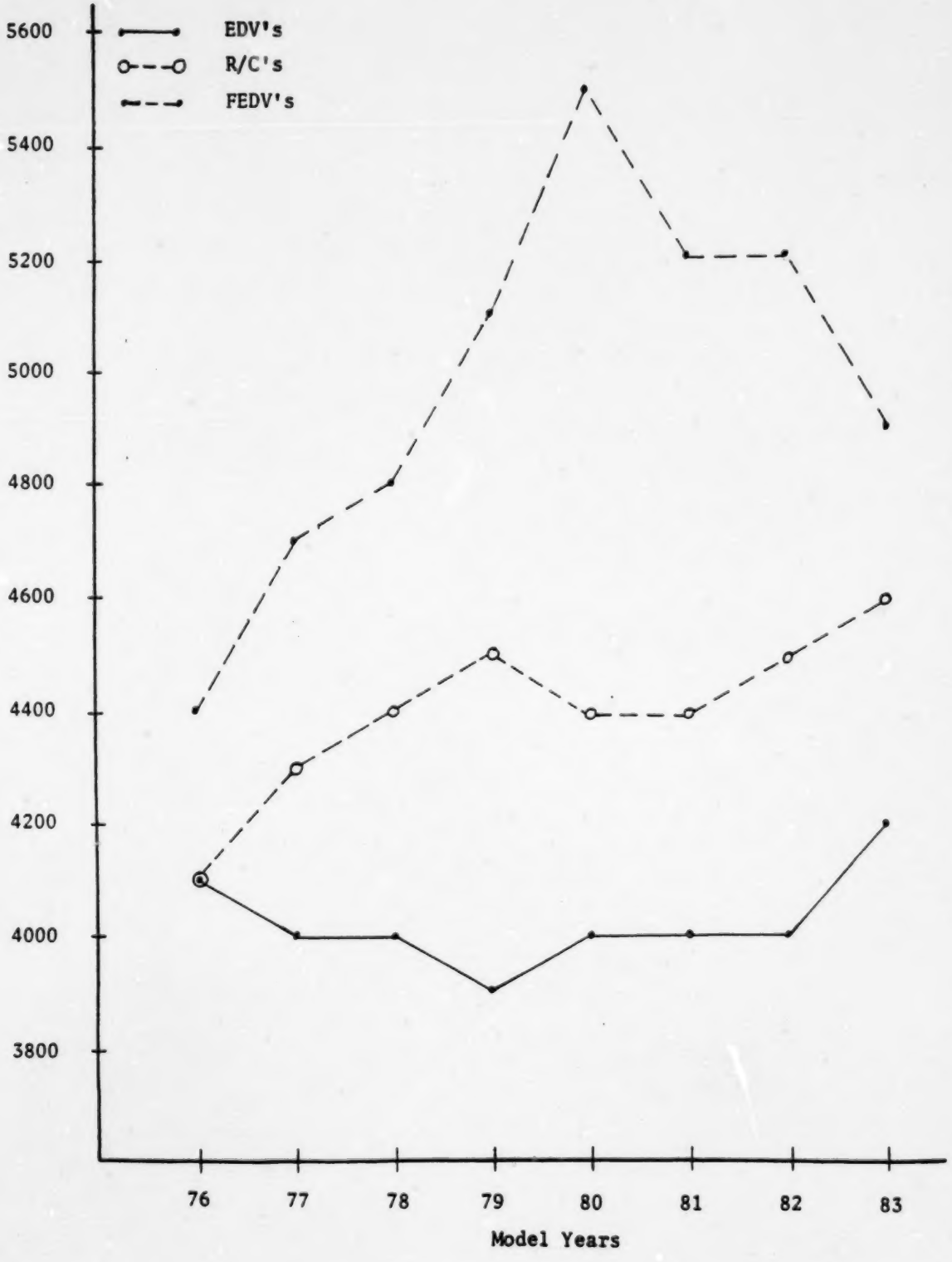
dependent on the sales fraction they represent in a manufacturer's product line. Thus, these mileage data only serve the purpose of illustrating the trends toward higher test vehicle mileages since 1975, but do not accurately reflect CAFE impacts.

On a manufacturer-specific basis, Figures 1 and 2 also illustrate individual manufacturer trends and compare general manufacturer positions. Domestic manufacturers, particularly General Motors and Ford, test their vehicles at significantly higher mileages than the foreign manufacturers. General Motors, Ford, and Chrysler also have tended to increase their average test mileages over those model years. American Motors tended to look more like the foreign manufacturers until 1982 when they exhibited a drastic increase in average test mileage. In general, with the exception of Honda, foreign manufacturers do not appear to have made an overall effort to test at higher mileages. Their averages have remained at near the 4,000-mile baseline through the years. It appears that Honda has greatly increased test mileage in 1982 and 1983.

Average test mileages of each of the previously described vehicle types are plotted by model year in Figure 3. It can be seen that on an overall average, FEDV's test mileages increased rapidly until the 1980 model year, then dropped off. It is not clear why this peak occurred, but from Figure 1 it appears to be heavily influenced by General Motors. (However, the General Motors peak is also unexplained.) Running change vehicles have exhibited a steady rise in test mileages, also exhibiting a slight peak in the 1979 model year. As expected, the EDV test mileages remained steady at around 4,000 miles, until the 1983 model year. For the 1983 model year, new rules took effect that allow manufacturers to test EDV's at any mileage. Although this was originally intended to save manufacturers money by running them at <u>less</u> than 4,000 miles, average EDV mileage data indicate an increase in mileage, presumably to obtain a fuel economy advantage. This increase in overall average EDV test mileage was nearly entirely due to the increases of American Motors, Chrysler, and Honda for 1983. (General Motors had a small increase of 200 miles over 1982.)

To summarize the test mileage trends, the overall trend from the 1975 baseline of 4,000 miles had to increase test mileage. The domestic manufacturers have tended to accumulate significantly more miles than the foreign manufacturers. Manufacturers appear to be using the new flexibility to test EDV's at higher mileages beginning in the 1983 model year, as evidenced by the increase in average EDV test mileages between the 1982 and 1983 model years.

Figure 3


EDV's
R/C's
FEDV's
5600
5400
5200
5000
4800
4600
4400
4200
4000
3800
76
77
78
79
80
81
82
83
Model Years

B. CAFE Impacts

The results of the CAFE recalculations for the 1979 through 1982 model years are shown in Tables 1 through 3. Each table represents a CAFE category and lists the mpg offset from high test vehicle mileage for each manufacturer and model year. For the latest available complete model year (1982) the passenger automobile overall sales-weighted CAFE offset is 0.18 mpg. For two-wheel drive light-duty trucks the 1982 offset is 0.44 mpg, and for four-wheel drive light-duty trucks, the 1982 offset is 0.19 mpg.

Table 1

Passenger Automobiles

[CAFE Original - CAFE Adjusted]

Manufacturer	1979	1980	1981	1982
		(mpg)		
AMC	0.01	0.01	0.27	0.01
Chrysler	0.06	0.07	0.27	0.25
Ford	0.18	0.11	0.09	0.20
Fuji	0.06	0.14	0.04	0.03
GM	0.21	0.26	0.50	0.23
Honda	0.05	0.01	0.01	0.14
Nissan	0.02	0.02	0.01	0.01
Toyo Kogyo	0.00	0.00	0.01	0.02
Toyota	0.00	0.07	0.00	0.02
VW	0.07	0.02	0.01	0.01
Sales Weighted Average:	0.17	0.18	0.29	0.18

Table 1 shows the passenger automobile CAFE offsets for each manufacturer. The overall averages for the 1979 through 1982 model years appear to be fairly constant except for the 1981 model year average. Looking more closely at the sources of the 1981 increase, Table 1 shows that three manufacturers, AMC, Chrysler, and GM, accounted for virtually all of the 1981 offset. GM, in particular, had nearly double the offset of either AMC or Chrysler, and since the overall averages are sales-weighted, the high GM offset had a strong influence on the average value. However, in the 1982 model year, AMC and GM significantly reduced their offsets to values closely in line with the 1979 and 1980 model years. In

contrast, for 1982, Ford exhibited an increase in their offset after showing decreases for the 1979 through 1981 model years. Given these fluctuations in offsets over these years, there does not seem to be a clear trend of increasing or decreasing offsets for any domestic manufacturer.

As reflected in the mileage accumulation trends (Figures 1 and 2), the domestic manufacturers have consistently exhibited higher passenger automobile CAFE offsets than the foreign manufacturers. The exception to this is VW, which is actually a domestic manufacturer but shows consistently very small offsets as do the Japanese manufacturers. All of the Japanese manufacturers had negligible offsets for all model years for passenger cars, except for Honda which showed a significant increase for 1982. This increase is also reflected in Honda's mileage accumulation trend (Figure 2).

Table 2

Light-Duty Trucks, 2-Wheel Drive

[$CAFE_{Original}$ - $CAFE_{Adjusted}$]

(mpg)

Manufacturer	1979	1980	1981	1982
AMC	0.30	No Vehicles	No Vehicles	0.00
Chrysler	0.01**	0.13	0.08	0.16**
Ford	0.23**	0.34	0.34	0.30**
GM	0.19**	0.36	0.14	0.81
Nissan	0.00**	0.00	0.07	0.01
Toyo Kogyo	0.00**	0.00	0.00	0.00
Toyota	0.00**	0.00	0.01	0.01
VW	0.00**	0.00	0.00	0.00
Sales Weighted Average:	0.16**	0.29	0.19	0.44

** - Combined with 4-wheel drive trucks as a manufacturer option.

Table 3

Light-Duty Trucks, 4-Wheel Drive

[$CAFE_{Original}$ - $CAFE_{Adjusted}$]

Manufacturer	1979 (mpg)	1980	1981	1982
AMC	0.00	0.00	0.09	0.02
Chrysler	**	0.08	0.13	0.16**
Ford	**	0.22	0.24	0.30**
GM	**	0.34	0.34	0.18
Nissan	**	0.00	0.03	0.00
Toyota	**	0.00	0.00	0.00
Sales Weighted Average:	**	0.18	.16	0.19

** - See 2-wheel drive trucks for combined 2-wheel drive and 4-wheel drive results.

Tables 2 and 3 show the 1979 through 1982 CAFE offsets for the two light-duty truck classes. These classes are more difficult to analyze because some manufacturers in some model years elected to combine the two-wheel drive (2WD) and four-wheel drive (4WD) vehicles into one CAFE class. (These occurrences are indicated in Tables 2 and 3.)

The overall 2WD averages widely fluctuate over the 1979 through 1982 model year span. This fluctuation appears to be caused primarily by GM's offset fluctuation over that period. In particular, the overall 1982 2WD average of 0.44 mpg was due to GM's offset of 0.81 mpg which is more than twice any other manufacturer's offset. As with the passenger car class, Volkswagen and the Japanese manufacturers exhibited virtually no offset due to test vehicle mileage accumulation, whereas the domestic manufacturers were usually in the 0.15 mpg to 0.35 mpg range.

The 4WD class (Table 3) showed much the same pattern as the 2WD class concerning domestic manufacturers versus the Japanese manufacturers, although there were only two Japanese manufacturers in this class. However, AMC showed virtually no offset for its 4WD trucks. Overall, the offsets for this class tended to be lower than in the 2WD class, and GM did not exhibit the same fluctuations as they did in the 2WD class. (In fact, GM showed a significant offset drop in 1982 for this class.)

In summary, for the four model years where we have been able to recalculate CAFE's, the CAFE offsets vary greatly between manufacturers. However, domestic manufacturers tend to account for virtually all of the overall offsets. Except in a few cases, the CAFE offsets show no definite model year trends. However, our average vehicle test mileage data for the 1976 through 1983 model years indicates a general trend of increasing test vehicle mileage accumulation.

The Effect of Vehicle Mileage Accumulation on Tested Fuel Economy

by

Kevin R. Tuckey

February 1981

Notice

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Technical Support Section
Certification Policy and Support Branch
Office of Mobile Source Air Pollution Control
U.S. Environmental Protection Agency

Background

EPA currently accepts fuel economy test data generated by vehicles with up to 10,000 miles accumulation on the drivetrain system. These data and data generated near the standard 4,000-mile test point are all used in the calculation of fuel economy values for the fuel economy labels and the Corporate Average Fuel Economy (CAFE). The vehicles tested above the standard 4,000-mile test point tend to produce higher measured fuel economy values than they would at the 4,000-mile test point. This increase is perhaps due to the effect of vehicle break-in which reduces drivetrain friction. The higher measured fuel economy value tends to bias upward the fuel economy calculations for labeling and CAFE when compared to calculations using only data generated close to the standard test point. EPA is proposing to adjust test values back to the projected 4,000-mile level when the mileage accumulation at the test point significantly influences the measured fuel economy value. This document presents the derivation of the proposed adjustments.

Data

We have examined several previous studies of mileage effects on tested fuel economy values. All of these previous studies were based on either certification emission durability vehicles, tested to 50,000 miles, or data from in-use fleets of vehicles. The durability data includes only two test points, at 5,000 and 10,000 miles, within the allowable range of testing for fuel economy calculation data. The in-use data included the effects of different drivers, vehicle maintenance, weather, etc. These variables can effect measured fuel economy values as much or more than the increase in vehicle mileage, thus preventing an analysis of the data for mileage effects alone. Therefore, we judged the existing studies of mileage effects on fuel economy as inadequate for our purposes.

To perform our own study of the effect of mileage accumulation on measured fuel economy values, we used the actual data being submitted to EPA for fuel economy calculation, i.e., the emission certification and fuel economy data vehicles. We examined all data with valid and passing emission tests that could have been used for fuel economy calculations, even if that particular test had not been selected or needed for the fuel economy calculation.

These data were then grouped by subconfiguration (a unique combination of engine displacement, fuel system, transmission, engine calibration, axle ratio, test weight, and road-load horsepower). Those groups were sorted to find groups that contained at least one city/highway test pair at (or within 250 miles of) the standard 4,000-mile test point, and another city/highway test pair at a test point more than 4,000 miles. There were over 800 tests that met these criteria. Multiple tests were averaged to include all available data, thus minimizing lab-to-lab and test-to-test differences in these data. These averaged data were normalized to a ratio

This equation gives a maximum correction factor of 5.3 percent at 10,000 miles. For example, a vehicle tested at 10,000 miles with test results of 25.0 mpg city and 35.0 mpg highway would be adjusted to the 4,000-mile test point fuel economy with values of 23.7 and 33.2 mpg. The benefit of the increased mileage on these test results were thus estimated to be about 1.3 mpg in the city and 1.8 mpg in the highway value.

Attachments

ATTACHMENT I

Sources of the Data Points Used in the Analysis
Distribution by Manufacturer and Model Year

	Model Year					
Manufacturer	1977	1978	1979	1980	1981	Mfr. Total
AMC	--	4	--	--	12	16
Chrysler	--	8	8	26	32	74
Ford	4	36	46	64	40	190
GM	8	54	78	32	36	208
Fiat	--	--	8	4	--	12
Model Year Total	12	102	140	126	120	500

ATTACHMENT II

Regression Results

Regression	Data	R. Coef.	Std. Error	Equation[1]	Correction Factors at Various Test Points[2] 4000	6200	10000
Linear	City	0.421	0.027	$.969 + .820 \times 10^{-5}(m)$	1.0018	1.0198	1.0510
	Highway	0.407	0.030	$.969 + .862 \times 10^{-5}(m)$	1.0035	1.0224	1.0552
	All	0.413	0.029	$.969 + .842 \times 10^{-5}(m)$	1.0027	1.0212	1.0532
Logarythmic	City	0.427	0.027	$.596 + .488 \times 10^{-1}(\ln m)$	1.0007	1.0221	1.0455
	Highway	0.422	0.030	$.566 + .526 \times 10^{-1}(\ln m)$	1.0023	1.0253	1.0505
	All	0.424	0.028	$.581 + .507 \times 10^{-1}(\ln m)$	1.0015	1.0237	1.0480
2nd Order	City	0.429	0.027	$.940 + .182 \times 10^{-4}(m) + -.795 \times 10^{-9}(m)^2$	1.0001	1.0223	1.0425
	Highway	0.439	0.029	$.899 + .331 \times 10^{-4}(m) + -.195 \times 10^{-8}(m)^2$	1.0002	1.0293	1.0350
	All	0.432	0.028	$.920 + .256 \times 10^{-4}(m) + -.138 \times 10^{-8}(m)^2$	1.0003	1.0257	1.0380
3rd Order	City	0.439	0.027	$.764 + .109 \times 10^{-3}(m) + -.157 \times 10^{-7}(m)^2 + .770 \times 10^{-12}(m)^3$	0.9981	1.0198	1.0540
	Highway	0.440	0.029	$.853 + .571 \times 10^{-4}(m) + -.587 \times 10^{-8}(m)^2 + .202 \times 10^{-12}(m)^3$	1.0004	1.0295	1.0390
	All	0.435	0.028	$.808 + .832 \times 10^{-4}(m) + -.108 \times 10^{-7}(m)^2 + .485 \times 10^{-12}(m)^3$	0.9990	1.0243	1.0450

1. m = System miles accumulated prior to test point. For system kilometers, divide the kilometers by 1.609344 to get miles or adjust the multiplicative constants in the equations.

2. To find the percent increase, substract one from the factor and multiply by 100. For example, linear correction factor at 10,000 miles = 1.0532 or 5.32 percent increase.

ATTACHMENT III

The following pages contain the data points used in this analysis. Each grouping of data contains the individual test result(s) for a given subconfiguration at a test point (separately for city and highway tests). The last line in each group, denoted by an indented manufacturer's name, contains the following:

A. The harmonically averaged fuel economy value.

B. The standard four thousand mile test points harmonically averaged fuel economy values (FE 4K).

C. The ratio of (A) divided by (B).

The headings are defined as follows:

MFR - Manufacturer of the vehicle.

ACYR - Active model year the test point is used for.

K - Code number, unique for each subconfiguration. This number has been assigned by the computer to sort the groups but cannot be used to identify what parameters were unique to the subconfiguration.

TNUM - Test number, assigned by EPA.

TPRO - Test procedure: C:1 - City test cycle; H:2 - Highway test cycle.

ODO - Odometer, in miles, at the test point.

RWMG - Rounded miles per gallon at the test point.

TTYP - Test type: EM:1 - Emission data vehicle;
FE:2 - Fuel economy data vehicle.

CTD - Certification test disposition;

PCRT[1] - Passed emission standards, used for emission certification.

PNCT[1] - Passed emission standards, not used for emission certification.

FED - Fuel economy disposition;

USED[2] - Used for fuel economy calculations.

NTUS[2] - Not used for fuel economy calculations.

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1. PCRT, PNCT--EPA uses only one test, coded PCRT, to issue on Emission Certificate of Conformity, the other tests that pass the emission standards but are not used are coded PNCT.

2. USED, NTUS--EPA is restricted in its selection of fuel economy data for use in fuel economy calculations. Data that is used in these calculations are coded USED, data that were not selected are coded NTUS.

MFR	ACYR	K	TNUM	TPPO	ODO	RWHP	TYYP	CTO	FED	INT#	VRSN	VID
FORD	77	356	771228	C :1	3857.0	20.6	EM:1	PCRT	USED	187600		721-2.3-P-30
FORD	77	356	771209	C :1	4232.0	21.6	EM:1	PCRT	USED	187400		7E1-2.3-P-25
----FORD	77	356		1	4044.5	21.1	FE4K:	21.1	RATIO:	1.0000		
FORD	77	356	71602	C :1	5233.0	22.5	FE:2	PNCT	USED	187400		7E1-2.3-P-25
----FORD	77	356		1	5233.0	22.5	FE4K:	21.1	RATIO:	1.0641		
FORD	77	356	771202	HW:2	3818.5	20.2	EM:1	PNCT	USED	187600		721-2.3-P-30
FORD	77	356	771208	HW:2	4240.0	20.2	EM:1	PCRT	USED	187400		7E1-2.3-P-25
---FORD	77	356		2	4081.4	20.2	FE4K:	20.2	RATIO:	1.0000		
FORD	77	356	71602	HW:2	5245.0	20.3	FE:2	PNCT	USED	187400		7E1-2.3-P-25
----FORD	77	356		2	5245.0	20.3	FE4K:	20.2	RATIO:	1.0034		
GM	77	448	71628	C :1	4217.0	24.5	FE:2	PNCT	NTUS	188803		7125C6
---- GM	77	448		1	4217.0	24.5	FE4K:	24.5	RATIO:	1.0000		
GM	77	448	71620	C :1	4288.0	25.7	FE:2	PNCT	NTUS	188803		7125C6
GM	77	448	71627	C :1	4388.0	25.0	FE:2	PNCT	NTUS	188803		7125C6
GM	77	448	71623	C :1	4583.0	24.8	FE:2	PNCT	NTUS	188803		7125C6
GM	77	448	71626	C :1	4611.0	24.2	FE:2	PNCT	NTUS	188803		7125C6
GM	77	448	773676	C :1	4688.0	24.5	FE:2	PNCT	USED	188803		7125C6
GM	77	448	773787	C :1	4702.0	24.7	FE:2	PNCT	USED	188803		7125C6
---- GM	77	448		1	4631.3	24.8	FE4K:	24.5	RATIO:	1.0188		
GM	77	448	71626	HW:2	4328.0	24.3	FE:2	PNCT	NTUS	188803		7125C6
---- GM	77	448		2	4328.0	24.3	FE4K:	24.3	RATIO:	1.0000		
GM	77	448	71630	HW:2	4388.0	25.4	FE:2	PNCT	USED	188803		7125C6
GM	77	448	71628	HW:2	4358.0	23.6	FE:2	PNCT	NTUS	188803		7125C6
GM	77	448	773675	HW:2	4670.0	24.3	FE:2	PNCT	NTUS	188803		7125C6
GM	77	448	773788	HW:2	4713.0	24.7	FE:2	PNCT	USED	188803		7125C6
---- GM	77	448		2	4520.0	24.5	FE4K:	24.3	RATIO:	1.0070		
GM	77	582	71736	C :1	4128.0	12.0	FE:2	PNCT	NTUS	230501		733151
---- GM	77	582		1	4128.0	12.0	FE4K:	12.0	RATIO:	1.0000		
GM	77	582	773818	C :1	4822.0	12.1	FE:2	PNCT	USED	230501		733151
---- GM	77	582		1	4822.0	12.1	FE4K:	12.0	RATIO:	1.0083		
GM	77	582	71735	HW:2	4140.0	17.2	FE:2	PNCT	USED	230501		733151
---- GM	77	582		2	4140.0	17.2	FE4K:	17.2	RATIO:	1.0000		
GM	77	582	773819	HW:2	4843.0	17.7	FE:2	PNCT	NTUS	230501		733151
---- GM	77	582		2	4843.0	17.7	FE4K:	17.2	RATIO:	1.0281		
AMC	78	949	80360	C :1	3780.0	21.1	EM:1	PNCT	USED	278800		P74-21S
AMC	78	949	781188	C :1	3767.0	21.6	EM:1	PCRT	NTUS	278800		P74-21S
---- AMC	78	949		1	3773.5	21.3	FE4K:	21.3	RATIO:	1.0000		
AMC	78	949	80108	C :1	4710.0	20.6	EM:1	PNCT	USED	390100		D84-11S
---- AMC	78	949		1	4710.0	20.6	FE4K:	21.3	RATIO:	0.9803		
AMC	78	949	781191	HW:2	3818.0	33.1	EM:1	PNCT	USED	278800		P74-21S
---- AMC	78	949		2	3818.0	33.1	FE4K:	33.1	RATIO:	1.0000		
AMC	78	949	80111	HW:2	4721.0	32.2	EM:1	PNCT	USED	390100		D84-11S
---- AMC	78	949		2	4721.0	32.3	FE4K:	33.1	RATIO:	0.9726		
CHRY	78	1088	82728	C :1	3812.0	18.9	EM:1	PNCT	USED	382200		A213
----CHRY	78	1088		1	3812.0	18.9	FE4K:	18.9	RATIO:	1.0000		
CHRY	78	1088	785308	C :1	4926.3	18.6	EM:1	PCRT	USED	383200		A243R
---CHRY	78	1088		1	4926.3	18.6	FE4K:	18.9	RATIO:	0.9841		
CHRY	78	1088	82730	HW:2	3823.0	21.5	EM:1	PNCT	USED	382200		A213
CHRY	78	1088	785250	HW:2	3883.7	23.0	EM:1	PNCT	NTUS	382200		A213
----CHRY	78	1088		2	3853.3	22.2	FE4K:	22.2	RATIO:	1.0000		
CHRY	78	1088	82728	HW:2	4879.0	20.5	EM:1	PNCT	NTUS	383200		A243R
CHRY	78	1088	785307	HW:2	4938.0	21.7	EM:1	PNCT	USED	383200		A243R
----CHRY	78	1088		2	4908.0	21.1	FE4K:	22.2	RATIO:	0.9488		
CHRY	78	1070	81424	C :1	3872.0	18.8	EM:1	PNCT	USED	325700		A201
CHRY	78	1070	784024	C :1	3873.4	18.4	EM:1	PCRT	NTUS	325700		A201
----CHRY	78	1070		1	3823.2	18.5	FE4K:	18.5	RATIO:	1.0000		
CHRY	78	1070	81851	C :1	7888.0	16.0	EM:1	PNCT	NTUS	328200		A206R
CHRY	78	1070	783480	C :1	7759.0	16.9	EM:1	PCRT	USED	328200		A206R
----CHRY	78	1070		1	7728.5	16.4	FE4K:	18.5	RATIO:	0.8749		
CHRY	78	1070	81425	HW:2	3884.0	25.8	EM:1	PNCT	USED	325700		A201
CHRY	78	1070	783928	HW:2	3892.0	25.3	EM:1	PNCT	NTUS	325700		A201
----CHRY	78	1070		2	3938.0	25.5	FE4K:	25.5	RATIO:	1.0000		
CHRY	78	1070	81852	HW:2	7708.0	22.5	EM:1	PNCT	USED	328200		A206R
CHRY	78	1070	783481	HW:2	7771.1	23.5	EM:1	PNCT	NTUS	328200		A206R
----CHRY	78	1070		2	7740.1	23.0	FE4K:	25.5	RATIO:	0.8998		
FORD	78	1117	81313	C :1	3993.0	12.7	EM:1	PNCT	NTUS	315800		8L1-400-P-211
FORD	78	1117	783251	C :1	4102.0	12.4	EM:1	PCRT	USED	315800		8L1-400-P-211
----FORD	78	1117		1	4047.5	12.5	FE4K:	12.5	RATIO:	1.0000		
FORD	78	1117	90284	C :1	4742.0	11.9	EM:1	PNCT	NTUS	315800		8L1-400-P-211
----FORD	78	1117		1	4742.0	11.9	FE4K:	12.5	RATIO:	0.9483		
FORD	78	1117	81314	HW:2	4028.0	15.3	EM:1	PNCT	NTUS	315800		8L1-400-P-211
FORD	78	1117	783250	HW:2	4120.0	17.4	EM:1	PNCT	USED	315800		8L1-400-P-211
----FORD	78	1117		2	4072.5	16.3	FE4K:	16.3	RATIO:	1.0000		
FORD	78	1117	90285	HW:2	4753.0	17.4	EM:1	PNCT	NTUS	315800		8L1-400-P-211
----FORD	78	1117		2	4753.0	17.4	FE4K:	16.3	RATIO:	1.0688		
FORD	78	1122	82373	C :1	3919.0	11.6	EM:1	PNCT	NTUS	324700		8A1-400-P-220
----FORD	78	1122		1	3919.0	11.6	FE4K:	11.6	RATIO:	1.0000		
FORD	78	1122	783189	C :1	6051.0	12.2	EM:1	PCRT	USED	324700		8A1-400-P-220
----FORD	78	1122		1	6051.0	12.2	FE4K:	11.6	RATIO:	1.0517		
FORD	78	1122	82374	HW:2	3930.0	18.4	EM:1	PNCT	NTUS	324700		8A1-400-P-220
----FORD	78	1122		2	3930.0	18.4	FE4K:	18.4	RATIO:	1.0000		
FORD	78	1122	783188	HW:2	6089.8	18.9	EM:1	PNCT	USED	324700		8A1-400-P-220
----FORD	78	1122		2	6089.8	18.9	FE4K:	18.4	RATIO:	1.0305		
FORD	78	1138	80881	C :1	3939.0	28.9	EM:1	PNCT	NTUS	301700		892-1.6-D-3
FORD	78	1138	782488	C :1	3972.0	29.9	EM:1	PCRT	USED	301700		892-1.6-D-3
---FORD	78	1138		1	3946.5	29.4	FE4K:	29.4	RATIO:	1.0000		
FORD	78	1138	82235	C :1	7195.0	29.8	FE:2	PNCT	USED	259202		892-1.6-C-6
----FORD	78	1138		1	7195.0	29.8	FE4K:	29.4	RATIO:	1.0071		
FORD	78	1138	80880	HW:2	3888.0	41.3	EM:1	PNCT	NTUS	301700		892-1.6-D-3
FORD	78	1138	782488	HW:2	3982.0	42.8	EM:1	PNCT	USED	301700		892-1.6-D-3
----FORD	78	1138		2	3939.0	41.3	FE4K:	41.3	RATIO:	1.0000		

MFR	ACYR	K	TNUM	TPRG	ODO	RWMG	TTYP	CTG	FED	INT#	VRSN	VIN
GM	78	1383	82989	C :1	3838.0	25.1	FE:2	PNCT	NTUS	338502		81W1-240F
---- GM	78	1383		1	3838.0	25.1	FE4K:	25.1	RATIO:	1.0000		
GM	78	1383	83187	C :1	4708.0	25.5	FE:2	PNCT	NTUS	322702		81W1-198P
GM	78	1383	786388	C :1	4807.4	25.3	FE:2	PNCT	USED	322702		81W1-198P
---- GM	78	1383		1	4831.2	25.4	FE4K:	25.1	RATIO:	1.0119		
GM	78	1383	788081	HW:2	4318.0	30.1	FE:2	PNCT	NTUS	338502		81W1-240F
GM	78	1383	83000	HW:2	4318.0	32.9	FE:2	PNCT	NTUS	338502		81W1-240F
--- GM	78	1383		2	4318.0	31.4	FE4K:	31.4	RATIO:	1.0000		
GM	78	1383	83156	HW:2	4806.0	34.0	FE:2	PNCT	NTUS	322702		81W1-198P
GM	78	1383	788400	HW:2	4878.6	34.6	FE:2	PNCT	USED	322702		81W1-198P
---- GM	78	1383		2	4842.3	34.2	FE4K:	31.4	RATIO:	1.0894		
GM	78	1378	82186	C :1	4003.0	18.4	FE:2	PNCT	USED	304801		81Y2-141P
---- GM	78	1378		1	4003.0	18.4	FE4K:	18.4	RATIO:	1.0000		
GM	78	1378	83208	C :1	8767.0	18.3	FE:2	PNCT	USED	375702		81Y2-7X178P
---- GM	78	1378		1	8767.0	18.3	FE4K:	18.4	RATIO:	0.9939		
GM	78	1378	82197	HW:2	4014.0	22.6	FE:2	PNCT	USED	304801		81Y2-141P
---- GM	78	1378		2	4014.0	22.6	FE4K:	22.6	RATIO:	1.0000		
GM	78	1378	83209	HW:2	8789.0	23.3	FE:2	PNCT	USED	375702		81Y2-7X178P
---- GM	78	1378		2	8789.0	23.3	FE4K:	22.6	RATIO:	1.0318		
GM	78	1382	81190	C :1	3887.0	13.8	EM:1	PNCT	NTUS	307800		81Y2-140C
GM	78	1382	82484	C :1	4153.0	13.8	EM:1	PCRT	USED	307801		81Y2-140C
---- GM	78	1382		1	4040.0	13.8	FE4K:	13.8	RATIO:	1.0000		
GM	78	1382	80431	C :1	4441.0	13.7	EM:1	PNCT	NTUS	307801		81Y2-140C
GM	78	1382	80434	C :1	4462.0	13.8	EM:1	PNCT	NTUS	307801		81Y2-140C
GM	78	1382	80432	C :1	4518.0	13.8	EM:1	PNCT	NTUS	307801		81Y2-140C
---- GM	78	1382		1	4473.7	13.8	FE4K:	13.8	RATIO:	1.0147		
GM	78	1382	81191	HW:2	3926.0	20.8	EM:1	PNCT	USED	307800		81Y2-140C
---- GM	78	1382		2	3926.0	20.8	FE4K:	20.8	RATIO:	1.0000		
GM	78	1382	82485	HW:2	4284.0	20.7	EM:1	PNCT	USED	307801		81Y2-140C
GM	78	1382	80433	HW:2	4529.0	20.7	EM:1	PNCT	NTUS	307801		81Y2-140C
---- GM	78	1382		2	4391.5	20.7	FE4K:	20.8	RATIO:	0.9952		
GM	78	1817	81488	C :1	3881.0	13.8	EM:1	PNCT	NTUS	331800		83M4-103P-1
GM	78	1817	783482	C :1	3831.0	14.1	EM:1	PCRT	USED	331800		83M4-103P-1
---- GM	78	1817		1	3898.0	13.8	FE4K:	13.8	RATIO:	1.0000		
GM	78	1817	783288	C :1	4518.0	14.3	EM:1	PCRT	NTUS	281302		83M4-103P
---- GM	78	1817		1	4518.0	14.3	FE4K:	13.8	RATIO:	1.0387		
GM	78	1817	81470	HW:2	3872.0	19.5	EM:1	PNCT	USED	331800		83M4-103P-1
GM	78	1817	783493	HW:2	3970.0	18.5	EM:1	PNCT	NTUS	331800		83M4-103P-1
GM	78	1817	81884	HW:2	4078.0	19.9	FE:2	PNCT	USED	331800		83M4-103P-1
GM	78	1817	81888	HW:2	4088.0	18.6	FE:2	PNCT	USED	331800		83M4-103P-1
---- GM	78	1817		2	4004.5	19.4	FE4K:	19.4	RATIO:	1.0000		
GM	78	1817	783400	HW:2	4529.2	19.5	EM:1	PNCT	NTUS	281302		83M4-103P
---- GM	78	1817		2	4529.2	19.5	FE4K:	19.4	RATIO:	1.0047		
GM	78	1840	81088	C :1	3874.0	17.0	EM:1	PNCT	NTUS	434800		84B2-48284P
GM	78	1840	782814	C :1	4024.1	16.7	EM:1	PNCT	NTUS	434800		84B2-48284P
--- GM	78	1840		1	3999.0	16.6	FE4K:	16.6	RATIO:	1.0000		
GM	78	1840	783188	C :1	8058.4	16.6	EM:1	PNCT	USED	434800		84B2-48284P
---- GM	78	1840		1	8058.4	16.6	FE4K:	16.6	RATIO:	0.9852		
GM	78	1840	782815	HW:2	4035.0	28.9	EM:1	PNCT	NTUS	434800		84B2-48284P
---- GM	78	1840		2	4035.0	28.9	FE4K:	28.9	RATIO:	1.0000		
GM	78	1840	783983	HW:2	8077.4	28.8	EM:1	PNCT	USED	434800		84B2-48284P
---- GM	78	1840		2	8077.4	28.8	FE4K:	28.9	RATIO:	0.9863		
GM	78	1864	93882	C :1	4068.0	18.9	FE:2	PNCT	NTUS	388309		84B2-3780P
---- GM	78	1864		1	4068.0	18.9	FE4K:	18.9	RATIO:	1.0000		
GM	78	1864	93886	C :1	4883.0	18.2	FE:2	PNCT	USED	388309		84B2-3780P
---- GM	78	1864		1	4883.0	18.2	FE4K:	18.9	RATIO:	0.9868		
GM	78	1864	93883	HW:2	4125.0	23.3	FE:2	PNCT	NTUS	388309		84B2-3780P
---- GM	78	1864		2	4125.0	23.3	FE4K:	23.3	RATIO:	1.0000		
GM	78	1864	93884	HW:2	4326.0	23.8	FE:2	PNCT	NTUS	388309		84B2-3780P
GM	78	1864	94580	HW:2	4703.0	23.8	FE:2	PNCT	USED	388309		84B2-3780P
---- GM	78	1864		2	4514.5	23.7	FE4K:	23.3	RATIO:	1.0171		
GM	78	1883	81581	C :1	3823.1	15.4	EM:1	PNCT	NTUS	338000		84E5-238P
GM	78	1883	783715	C :1	3892.0	15.5	EM:1	PCRT	USED	338000		84E5-238P
---- GM	78	1883		1	3857.5	15.4	FE4K:	15.4	RATIO:	1.0000		
GM	78	1883	82188	C :1	4932.0	18.1	FE:2	PNCT	USED	353100		84E5-5711GP
GM	78	1883	784682	C :1	5147.8	18.8	FE:2	PNCT	NTUS	353100		84E5-5711GP
---- GM	78	1883		1	5039.9	18.3	FE4K:	18.4	RATIO:	1.0580		
GM	78	1883	81734	HW:2	3834.1	21.2	EM:1	PNCT	USED	338000		84E5-238P
GM	78	1883	783716	HW:2	3911.0	20.1	EM:1	PNCT	NTUS	338000		84E5-238P
---- GM	78	1883		2	3872.5	20.8	FE4K:	20.8	RATIO:	1.0000		
GM	78	1883	82187	HW:2	4943.0	21.8	FE:2	PNCT	NTUS	353100		84E5-5711GP
GM	78	1883	784683	HW:2	5168.0	22.4	FE:2	PNCT	USED	353100		84E5-5711GP
---- GM	78	1883		2	5056.5	22.1	FE4K:	20.8	RATIO:	1.0708		
GM	78	1893	80750	C :1	3888.0	11.0	EM:1	PNCT	NTUS	294900		85J0-130C
GM	78	1893	782112	C :1	3831.0	11.2	EM:1	PCRT	USED	294900		85J0-130C
---- GM	78	1893		1	3859.5	11.1	FE4K:	11.1	RATIO:	1.0000		
GM	78	1893	82180	C :1	8890.0	12.0	FE:2	PNCT	NTUS	340801		85J0-7023P
GM	78	1893	784648	C :1	8832.0	12.2	FE:2	PNCT	USED	340901		85J0-7023P
---- GM	78	1893		1	8761.0	12.1	FE4K:	11.1	RATIO:	1.0901		
GM	78	1893	80856	HW:2	3887.0	17.9	EM:1	PNCT	NTUS	294900		85J0-130C
GM	78	1893	782113	HW:2	3943.0	18.5	EM:1	PNCT	USED	294900		85J0-130C
---- GM	78	1893		2	3908.0	18.2	FE4K:	18.2	RATIO:	1.0000		
GM	78	1893	82181	HW:2	8701.0	19.9	FE:2	PNCT	NTUS	340901		85J0-7023P
GM	78	1893	784647	HW:2	9843.0	18.8	FE:2	PNCT	USED	340901		85J0-7023P
--- GM	78	1893		2	9772.0	18.8	FE4K:	18.2	RATIO:	1.0989		
GM	78	1898	80827	C :1	3885.0	13.7	EM:1	PNCT	USED	283900		85J0-111P
GM	78	1898	781723	C :1	3962.0	13.4	EM:1	PCRT	NTUS	283900		85J0-111P
GM	78	1898	81833	C :1	4065.0	13.5	EM:1	PNCT	USED	283900		85J0-111P
---- GM	78	1898		1	3870.7	13.5	FE4K:	13.8	RATIO:	1.0000		
GM	78	1898	81882	C :1	8488.0	14.1	FE:2	PNCT	NTUS	340800		85J0-7023P
GM	78	1898	784008	C :1	8886.0	13.8	FE:2	PNCT	USED	340800		85J0-7023P

MFR	ACYR	K	TNUM	TPRD	ODO	RWHS	TTYP	CTD	FED	INT#	VRSN	VID
FORD	79	2434	82224	C :1	4119.0	19.0	FE:2	PNCT	NTUS	487703		9B1-3.3-P-138
----FORD	79	2434		1	4119.0	19.0	FE4K:	19.0	RATIO:	1.0000		
FORD	79	2434	82083	C :1	4588.0	17.2	FE:2	PNCT	NTUS	487703		
FORD	79	2434	795388	C :1	4588.3	18.4	FE:2	PNCT	USED	487703		9B1-3.3-P-138
----FORD	79	2434		1	4533.8	17.8	FE4K:	19.0	RATIO:	0.9388		9B1-3.3-P-138
FORD	79	2434	83228	HW:2	4130.0	28.8	FE:2	PNCT	NTUS	487703		
---FORD	79	2434		2	4130.0	28.8	FE4K:	28.8	RATIO:	1.0000		9B1-3.3-P-138
FORD	79	2434	83084	HW:2	4463.0	24.8	FE:2	PNCT	NTUS	487703		
FORD	79	2434	795370	HW:2	4588.3	25.0	FE:2	PNCT	USED	487703		9B1-3.3-P-138
----FORD	79	2434		2	4611.1	24.8	FE4K:	28.8	RATIO:	0.8323		9B1-3.3-P-138
FORD	79	2443	80887	C :1	4001.0	17.3	EM:1	PNCT	NTUS	408800		
FORD	79	2443	792178	C :1	4148.0	17.1	EM:1	PCRT	USED	408800		9D1-6.1-P-148
----FORD	79	2443		1	4073.0	17.2	FE4K:	17.2	RATIO:	1.0000		9D1-6.1-P-148
FORD	79	2443	88487	C :1	8781.0	17.8	FE:2	PNCT	USED	527404		
FORD	79	2443	88470	C :1	8835.0	17.7	FE:2	PNCT	USED	527404		9D1-6.1-N-408
FORD	79	2443	88471	C :1	8874.0	17.8	FE:2	PNCT	USED	527404		9D1-6.1-N-408
----FORD	79	2443		1	8833.3	17.7	FE4K:	17.2	RATIO:	1.0310		9D1-6.1-N-408
FORD	79	2443	84371	C :1	8482.0	17.0	FE:2	PNCT	NTUS	518200		
FORD	79	2443	84373	C :1	8639.0	17.8	FE:2	PNCT	NTUS	518200		9D1-6.1-N-147
FORD	79	2443	787887	C :1	8782.0	17.6	FE:2	PNCT	USED	518200		9D1-6.1-N-147
----FORD	79	2443		1	8611.0	17.8	FE4K:	17.2	RATIO:	1.0386		9D1-6.1-N-147
FORD	79	2443	80888	HW:2	4013.0	33.1	EM:1	PNCT	NTUS	408800		
FORD	79	2443	781808	HW:2	4113.0	33.8	EM:1	PNCT	USED	408800		9D1-6.1-P-148
----FORD	79	2443		2	4083.0	33.8	FE4K:	33.8	RATIO:	1.0000		9D1-6.1-P-148
FORD	79	2443	85468	HW:2	8772.0	24.5	FE:2	PNCT	USED	527404		
FORD	79	2443	85469	HW:2	8807.0	24.6	FE:2	PNCT	USED	527404		9D1-6.1-N-408
FORD	79	2443	85472	HW:2	8885.0	24.1	FE:2	PNCT	USED	527404		9D1-6.1-N-408
----FORD	79	2443		2	8821.3	24.4	FE4K:	33.8	RATIO:	1.0831		9D1-6.1-N-408
FORD	79	2443	84372	HW:2	8812.0	24.3	FE:2	PNCT	NTUS	518200		
FORD	79	2443	84374	HW:2	8850.0	24.7	FE:2	PNCT	NTUS	518200		9D1-6.1-N-147
FORD	79	2443	787817	HW:2	8713.7	24.0	FE:2	PNCT	USED	518200		9D1-6.1-N-147
----FORD	79	2443		2	8824.9	24.3	FE4K:	33.8	RATIO:	1.0803		9D1-6.1-N-147
FORD	79	2504	80738	C :1	3863.0	14.8	EM:1	PNCT	NTUS	417800		
FORD	79	2504	792802	C :1	3807.7	14.2	EM:1	PCRT	USED	417800		9B1-5.0-P-183
----FORD	79	2504		1	3815.3	14.4	FE4K:	14.4	RATIO:	1.0000		9B1-5.0-P-183
FORD	79	2504	85293	C :1	4704.0	14.2	FE:2	PNCT	USED	498802		
FORD	79	2504	85288	C :1	4744.0	14.8	FE:2	PNCT	USED	498802		9B1-5.0-G-327
----FORD	79	2504		1	4724.0	14.3	FE4K:	14.4	RATIO:	0.9958		9B1-5.0-G-327
FORD	79	2504	80738	HW:2	3844.0	21.0	EM:1	PNCT	NTUS	417800		
FORD	79	2504	792187	HW:2	3926.0	20.2	EM:1	PNCT	USED	417800		9B1-5.0-P-183
----FORD	79	2504		2	3888.0	20.6	FE4K:	20.8	RATIO:	1.0000		9B1-5.0-P-183
FORD	79	2504	85293	HW:2	4678.0	21.2	FE:2	PNCT	USED	498802		
FORD	79	2504	85284	HW:2	4715.0	20.8	FE:2	PNCT	USED	498802		9B1-5.0-G-327
----FORD	79	2504		2	4698.0	21.0	FE4K:	20.8	RATIO:	1.0221		9B1-5.0-G-327
FORD	79	2505	81049	C :1	3858.0	14.8	EM:1	PNCT	NTUS	425200		
FORD	79	2505	792768	C :1	3814.8	14.7	EM:1	PCRT	USED	425200		9D1-5.0-P-258
----FORD	79	2505		1	3868.4	14.7	FE4K:	14.7	RATIO:	1.0000		9D1-5.0-P-258
FORD	79	2505	84788	C :1	5068.0	14.0	EM:1	PNCT	NTUS	425204		
FORD	79	2505	787782	C :1	5156.0	14.8	EM:1	PCRT	USED	425204		9D1-5.0-P-258
----FORD	79	2505		1	5142.0	14.4	FE4K:	14.7	RATIO:	0.9795		9D1-5.0-P-258
FORD	79	2505	81050	HW:2	3803.0	21.8	EM:1	PNCT	NTUS	425200		
FORD	79	2505	792785	HW:2	3925.8	20.4	EM:1	PNCT	USED	425200		9D1-5.0-P-258
----FORD	79	2505		2	3884.4	21.0	FE4K:	21.0	RATIO:	1.0000		9D1-5.0-P-258
FORD	79	2505	84888	HW:2	5108.0	20.8	EM:1	PNCT	NTUS	425204		
FORD	79	2505	787781	HW:2	5206.8	20.7	EM:1	PNCT	USED	425204		9D1-5.0-P-258
----FORD	79	2505		2	5157.4	20.8	FE4K:	21.0	RATIO:	0.9841		9D1-5.0-P-258
FORD	79	2506	82935	C :1	4089.0	15.1	FE:2	PNCT	NTUS	425202		
FORD	79	2506	82937	C :1	4139.0	15.5	FE:2	PNCT	NTUS	425202		9D1-5.0-P-258
----FORD	79	2506		1	4118.0	15.3	FE4K:	15.3	RATIO:	1.0000		9D1-5.0-P-258
FORD	79	2506	795889	C :1	4888.7	14.9	FE:2	PNCT	USED	425202		
----FORD	79	2506		1	4888.7	14.9	FE4K:	15.3	RATIO:	0.9740		9D1-5.0-P-258
FORD	79	2506	82938	HW:2	4110.0	23.5	FE:2	PNCT	NTUS	425202		
FORD	79	2506	82936	HW:2	4158.0	22.7	FE:2	PNCT	NTUS	425202		9D1-5.0-P-258
----FORD	79	2506		2	4134.0	23.8	FE4K:	22.8	RATIO:	1.0000		9D1-5.0-P-258
FORD	79	2506	795870	HW:2	4960.7	24.7	FE:2	PNCT	USED	425202		
FORD	79	2506	795138	HW:2	5009.2	20.8	FE:2	PNCT	USED	425202		9D1-5.0-P-258
----FORD	79	2506		2	4984.9	22.8	FE4K:	22.8	RATIO:	0.9940		9D1-5.0-P-258
FORD	79	2519	81080	C :1	3885.0	13.0	EM:1	PNCT	USED	434500		
FORD	79	2519	792809	C :1	3964.0	13.5	EM:1	PCRT	NTUS	434500		9B1-5.8M-P-188
----FORD	79	2519		1	3929.5	13.2	FE4K:	13.2	RATIO:	1.0000		9B1-5.8M-P-188
FORD	79	2519	83792	C :1	5808.0	13.0	FE:2	PNCT	USED	493900		
FORD	79	2519	83794	C :1	5885.0	12.9	FE:2	PNCT	USED	493900		9W1-5.8M-H-183
----FORD	79	2519		1	5847.0	12.9	FE4K:	13.2	RATIO:	0.9777		9W1-5.8M-H-183
FORD	79	2519	81181	HW:2	3908.0	19.2	EM:1	PNCT	NTUS	434500		
FORD	79	2519	792827	HW:2	3982.8	18.9	EM:1	PNCT	USED	434500		9B1-5.8M-P-188
----FORD	79	2519		2	3944.4	19.0	FE4K:	19.0	RATIO:	1.0000		9B1-5.8M-P-188
FORD	79	2519	83791	HW:2	5780.0	19.9	FE:2	PNCT	USED	493900		
FORD	79	2519	83793	HW:2	5820.0	19.9	FE:2	PNCT	USED	493900		9W1-5.8M-H-183
----FORD	79	2519		2	5800.0	19.8	FE4K:	19.0	RATIO:	1.0447		9W1-5.8M-H-183
FORD	79	2548	83972	C :1	3878.0	13.5	FE:2	PNCT	USED	488300		
----FORD	79	2548		1	3878.0	13.5	FE4K:	13.5	RATIO:	1.0000		9A1-5.8W-U-200
FORD	79	2548	84378	C :1	5788.0	13.8	FE:2	PNCT	USED	518300		
FORD	79	2548	84377	C :1	5827.0	14.1	FE:2	PNCT	USED	518300		9M1-5.8W-N-407
----FORD	79	2548		1	5807.5	13.9	FE4K:	13.5	RATIO:	1.0332		9M1-5.8W-N-407
FORD	79	2548	83971	HW:2	4138.0	21.2	FE:2	PNCT	NTUS	488300		
FORD	79	2548	795382	HW:2	4218.8	18.8	FE:2	PNCT	USED	488300		9A1-5.8W-U-200
---FORD	79	2548	795381	HW:2	4265.8	18.8	FE:2	PNCT	USED	488300		9A1-5.8W-U-200
				2	4200.2	20.1	FE4K:	20.1	RATIO:	1.0000		9A1-5.8W-U-200
FORD	79	2548	84376	HW:2	5788.0	20.1	FE:2	PNCT	USED	518300		
FORD	79	2548	84375	HW:2	5838.0	20.4	FE:2	PNCT	USED	518300		9M1-5.8W-N-407
----FORD	79	2548		2	5813.0	20.2	FE4K:	20.1	RATIO:	1.0088		9M1-5.8W-N-407
GM	79	2598	81784	C :1	3985.0	18.1	EM:1	PNCT	USED	427901		915F98
GM	79	2598	82180	C :1	3997.0	18.5	EM:1	PNCT	USED	427901		915F98
---- GM	79	2598		1	3991.0	18.4	FE4K:	18.4	RATIO:	1.0000		

MFR	ACYR	K	TNUM	TPRG	ODO	RWHC	TTYP	CTG	FED	INT#	VRSN	VID
----	GM	79	2780		1	4080.0	20.2	FE4K: 20.2	RATIO:	1.0000		
	GM	79	2780	797680	C :1	4852.0	19.9	FE:2 PNCT USED	443302			93JF105
----	GM	79	2780		1	4852.0	19.8	FE4K: 20.2	RATIO:	0.9851		
	GM	79	2780	84108	HW:2	4081.0	20.7	EM:1 PNCT USED	443302			93JF105
----	GM	79	2780		2	4081.0	20.7	FE4K: 20.7	RATIO:	1.0000		
	GM	79	2780	797308	HW:2	4084.0	27.6	FE:2 PNCT NTUS	443302			93JF105
---	GM	79	2780		3	4084.0	27.6	FE4K: 20.7	RATIO:	1.0337		
	GM	79	2788	80842	C :1	3777.2	13.6	EM:1 PNCT NTUS	418300			93MC48
	GM	79	2788	782378	C :1	3848.0	13.9	EM:1 PCRT USED	418300			93MC48
----	GM	79	2788		1	3813.1	13.8	FE4K: 13.8	RATIO:	1.0000		
	GM	79	2788	81738	C :1	8088.0	13.9	FE:2 PNCT USED	488701			93M4-78819C
----	GM	79	2788		1	8088.0	13.9	FE4K: 13.8	RATIO:	1.0288		
	GM	79	2788	80844	HW:2	3788.0	18.1	EM:1 PNCT NTUS	418300			93MC48
	GM	79	2788	782380	HW:2	3867.3	18.7	EM:1 PNCT USED	418300			93MC48
----	GM	79	2788		2	3827.6	18.8	FE4K: 18.8	RATIO:	1.0000		
	GM	79	2788	81738	HW:2	8088.0	19.6	FE:2 PNCT USED	488701			93M4-78819C
----	GM	79	2788		2	8088.0	19.6	FE4K: 18.8	RATIO:	1.0477		
	GM	79	2801	81838	C :1	3783.3	14.6	EM:1 PNCT NTUS	448000			93MF128
	GM	79	2801	784001	C :1	3857.8	14.4	EM:1 PCRT USED	448000			93MF128
----	GM	79	2801		1	3830.8	14.5	FE4K: 14.5	RATIO:	1.0000		
	GM	79	2801	82837	C :1	8217.0	15.8	FE:2 PNCT USED	488704			93M4-78819C
----	GM	79	2801		1	8217.0	15.8	FE4K: 14.5	RATIO:	1.0888		
	GM	79	2801	81838	HW:2	3788.1	19.8	EM:1 PNCT USED	448000			93MF128
	GM	79	2801	784002	HW:2	3868.0	16.8	EM:1 PNCT NTUS	448000			93MF128
----	GM	79	2801		2	3831.5	19.4	FE4K: 19.4	RATIO:	1.0000		
	GM	79	2801	82838	HW:2	8228.0	21.8	FE:2 PNCT USED	488704			93M4-78819C
----	GM	79	2801		2	8228.0	21.8	FE4K: 19.4	RATIO:	1.1141		
	GM	79	2840	81218	C :1	3787.6	18.0	EM:1 PNCT NTUS	438800			948F80
	GM	79	2840	783184	C :1	3868.1	17.8	EM:1 PCRT USED	438800			948F80
----	GM	79	2840		1	3812.9	17.9	FE4K: 17.9	RATIO:	1.0000		
	GM	79	2840	82480	C :1	8841.0	19.4	FE:2 PNCT NTUS	472300			9482-4871
----	GM	79	2840		1	8841.0	19.4	FE4K: 17.9	RATIO:	1.0838		
	GM	79	2840	81220	HW:2	3794.5	24.7	EM:1 PNCT USED	438800			948F80
	GM	79	2840	783861	HW:2	3869.0	23.2	EM:1 PNCT NTUS	438800			948F80
----	GM	79	2840		2	3833.8	23.8	FE4K: 23.8	RATIO:	1.0000		
	GM	79	2840	82481	HW:2	8858.0	23.8	FE:2 PNCT NTUS	472300			9482-4871
----	GM	79	2840		2	8858.0	23.8	FE4K: 23.8	RATIO:	0.9847		
	GM	79	2848	785288	C :1	4138.8	18.8	EM:1 PNCT USED	438802			948F80
----	GM	79	2848		1	4138.8	18.8	FE4K: 18.8	RATIO:	1.0000		
	GM	79	2848	82708	C :1	8082.0	18.8	FE:2 PNCT USED	472304			9482-4871
----	GM	79	2848		1	8082.0	18.8	FE4K: 18.8	RATIO:	1.0841		
	GM	79	2848	785308	HW:2	4147.3	24.8	EM:1 PNCT USED	438802			948F80
----	GM	79	2848		2	4147.3	24.8	FE4K: 24.8	RATIO:	1.0000		
	GM	79	2848	82708	HW:2	8093.0	27.4	FE:2 PNCT NTUS	472304			9482-4871
	GM	79	2848	785336	HW:2	8180.8	25.0	FE:2 PNCT USED	472304			9482-4871
---	GM	79	2848		2	8121.5	26.1	FE4K: 24.8	RATIO:	1.0828		
	GM	79	2859	82982	C :1	3853.0	18.2	EM:1 PNCT NTUS	475700			9482-58148
----	GM	79	2859		1	3853.0	18.2	FE4K: 18.2	RATIO:	1.0000		
	GM	79	2859	83847	C :1	7321.0	18.0	FE:2 PNCT NTUS	475700			9482-58148
	GM	79	2859	788111	C :1	7488.2	17.7	FE:2 PNCT USED	475700			9482-58148
----	GM	79	2859		1	7408.1	17.8	FE4K: 18.2	RATIO:	0.9807		
	GM	79	2859	82883	HW:2	3883.0	24.1	EM:1 PNCT NTUS	475700			9482-58148
----	GM	79	2859		2	3883.0	24.1	FE4K: 24.1	RATIO:	1.0000		
	GM	79	2859	82868	HW:2	7332.0	23.8	FE:2 PNCT NTUS	475700			9482-58148
	GM	79	2859	788101	HW:2	7488.0	22.6	FE:2 PNCT USED	475700			9482-58148
----	GM	79	2859		2	7398.5	23.2	FE4K: 24.1	RATIO:	0.9840		
	GM	79	2868	81288	C :1	3820.0	14.5	EM:1 PNCT NTUS	442800			94JF94
	GM	79	2868	783338	C :1	3894.3	14.7	EM:1 PCRT USED	442800			94JF94
----	GM	79	2868		1	3857.1	14.6	FE4K: 14.8	RATIO:	1.0000		
	GM	79	2868	82098	C :1	8410.0	16.1	FE:2 PNCT USED	488900			94J4-87118F
----	GM	79	2868		1	8410.0	16.1	FE4K: 14.8	RATIO:	1.1028		
	GM	79	2868	81287	HW:2	3831.8	21.4	EM:1 PNCT NTUS	442800			94JF94
	GM	79	2868	783337	HW:2	3908.3	20.2	EM:1 PNCT USED	442800			94JF94
----	GM	79	2868		2	3868.4	20.8	FE4K: 20.8	RATIO:	1.0000		
	GM	79	2868	82084	HW:2	8378.0	21.3	FE:2 PNCT USED	488900			94J4-87118F
	GM	79	2868	82098	HW:2	8421.0	22.2	FE:2 PNCT USED	488900			94J4-87118F
----	GM	79	2868		2	8399.5	21.7	FE4K: 20.8	RATIO:	1.0481		
	GM	71	2880	81282	C :1	3877.2	14.9	EM:1 PNCT NTUS	448800			94JF88
	GM	79	2880	783624	C :1	4019.3	14.3	EM:1 PCRT USED	448800			94JF88
----	GM	79	2880		1	3948.3	14.6	FE4K: 14.8	RATIO:	1.0000		
	GM	79	2880	82087	C :1	8440.0	14.9	FE:2 PNCT NTUS	488901			94J4-87118F
	GM	71	2880	82089	C :1	8500.0	15.2	FE:2 PNCT NTUS	488901			94J4-87118F
	GM	79	2880	784871	C :1	8583.8	14.8	FE:2 PNCT USED	488901			94J4-87118F
----	GM	79	2880		1	8507.9	15.0	FE4K: 14.8	RATIO:	1.0254		
	GM	79	2880	81283	HW:2	3813.8	20.1	EM:1 PNCT NTUS	448800			94JF88
	GM	79	2880	783625	HW:2	4030.1	19.9	EM:1 PNCT USED	448800			94JF88
----	GM	79	2880		2	3971.8	20.0	FE4K: 20.0	RATIO:	1.0000		
	GM	79	2880	82088	HW:2	8470.0	20.8	FE:2 PNCT NTUS	488901			94J4-87118F
	GM	79	2880	82100	HW:2	8510.0	20.8	FE:2 PNCT NTUS	488901			94J4-87118F
	GM	79	2880	784872	HW:2	8581.0	20.0	FE:2 PNCT USED	488901			94J4-87118F
----	GM	79	2880		2	8520.3	20.5	FE4K: 20.0	RATIO:	1.0263		
	GM	79	2901	81248	C :1	3777.0	13.1	EM:1 PNCT USED	443200			98JC117
	GM	79	2901	783402	C :1	3850.1	12.8	EM:1 PCRT NTUS	443200			98JC117
----	GM	79	2901		1	3813.5	12.9	FE4K: 12.9	RATIO:	1.0000		
	GM	79	2901	82198	C :1	8723.0	13.4	FE:2 PNCT USED	488800			98J0-80358C
---	GM	79	2901		1	8723.0	13.4	FE4K: 12.9	RATIO:	1.0348		
	GM	79	2901	81247	HW:2	3788.5	20.4	EM:1 PNCT NTUS	443200			98JC117
	GM	79	2901	783713	HW:2	3900.8	20.1	EM:1 PNCT USED	443200			98JC117
----	GM	79	2901		2	3844.6	20.2	FE4K: 20.2	RATIO:	1.0000		
	GM	79	2901	82200	HW:2	8735.0	20.9	FE:2 PNCT USED	488800			98J0-80358C

MFR	ACTR	K	TNUM	TPRG	DDS	RWMS	TTYP	CTD	FED	INT#	VRSN	VID
CHRY	80	3868	98338	HW:2	4838.0	17.1	EM:1	PNCT	USED	$85197		C312
----CHRY	80	3868		2	4838.0	17.1	FE4K:	16.7	RATIO:	1.0241		
CHRY	80	3868	98452	C :1	3788.0	9.2	EM:1	PNCT	NTUS	$42400		C308
CHRY	80	3868	788272	C :1	3878.8	9.4	EM:1	PCRT	USED	$42400		C308
----CHRY	80	3868		1	3821.8	9.3	FE4K:	9.3	RATIO:	1.0000		
CHRY	80	3868	97308	C :1	4335.0	9.7	FE:2	PNCT	NTUS	$42403		C308
CHRY	80	3868	788896	C :1	4551.0	9.8	FE:2	PNCT	USED	$42403		C308
---CHRY	80	3868		1	4438.0	9.8	FE4K:	9.3	RATIO:	1.0323		
CHRY	80	3868	98452	HW:2	3778.0	11.3	EM:1	PNCT	USED	$42400		C308
CHRY	80	3868	97528	HW:2	3992.0	12.1	EM:1	PNCT	USED	$42400		C308
----CHRY	80	3868		2	3884.0	11.7	FE4K:	11.7	RATIO:	1.0000		
CHRY	80	3868	97310	HW:2	4337.0	12.8	FE:2	PNCT	NTUS	$42403		C308
CHRY	80	3868	788857	HW:2	4582.0	12.7	FE:2	PNCT	USED	$42403		C308
----CHRY	80	3868		2	4448.8	12.8	FE4K:	11.7	RATIO:	1.0824		
FORD	80	3880	98728	C :1	4027.0	16.5	EM:1	PCRT	USED	$21801		0B1-2.3-C-248
FORD	80	3880	98866	C :1	4168.0	17.4	EM:1	PNCT	USED	$21801		0B1-2.3-C-248
----FORD	80	3880		1	4107.8	16.9	FE4K:	16.9	RATIO:	1.0006		
FORD	80	3880	98731	C :1	4580.0	16.5	FE:2	PNCT	USED	$01305		0Z1-2.3-F-238
FORD	80	3880	98881	C :1	4638.0	16.5	FE:2	PNCT	USED	$01305		0Z1-2.3-F-238
----FORD	80	3880		1	4606.0	17.4	FE4K:	16.9	RATIO:	1.0288		
FORD	80	3880	98730	HW:2	4038.0	22.8	EM:1	PNCT	USED	$21801		0B1-2.3-C-248
FORD	80	3880	98883	HW:2	4162.0	24.1	EM:1	PNCT	USED	$21801		0B1-2.3-C-248
----FORD	80	3880		2	4100.0	23.4	FE4K:	23.4	RATIO:	1.0000		
FORD	80	3880	98726	HW:2	4582.0	23.8	FE:2	PNCT	USED	$01305		0Z1-2.3-F-238
FORD	80	3880	98883	HW:2	4848.0	23.2	FE:2	PNCT	USED	$01305		0Z1-2.3-F-238
----FORD	80	3880		2	4500.5	23.5	FE4K:	23.4	RATIO:	1.0048		
FORD	80	3727	97575	C :1	3782.0	18.5	EM:1	PNCT	NTUS	$08700		0A1-5.0-F-328
FORD	80	3727	799865	C :1	3848.5	18.9	EM:1	PCRT	USED	$08700		0A1-5.0-F-328
----FORD	80	3727		1	3885.3	18.7	FE4K:	18.7	RATIO:	1.0000		
FORD	80	3727	96024	C :1	5648.0	17.0	FE:2	PNCT	NTUS	$19800		9H07
FORD	80	3727	98148	C :1	5730.0	17.1	FE:2	PNCT	USED	$19800		9H07
----FORD	80	3727		1	5688.0	17.0	FE4K:	16.7	RATIO:	1.0211		
FORD	80	3727	97576	HW:2	3783.0	25.6	EM:1	PNCT	NTUS	$08700		0A1-5.0-F-328
FORD	80	3727	799866	HW:2	3874.2	25.1	EM:1	PNCT	USED	$08700		0A1-5.0-F-328
----FORD	80	3727		2	3883.6	25.3	FE4K:	25.3	RATIO:	1.0000		
FORD	80	3727	96035	HW:2	5882.0	25.8	FE:2	PNCT	NTUS	$19800		9H07
FORD	80	3727	98147	HW:2	5741.0	25.1	FE:2	PNCT	USED	$19800		9H07
----FORD	80	3727		2	5718.5	25.3	FE4K:	25.3	RATIO:	1.0418		
FORD	80	3743	99188	C :1	3788.0	18.8	EM:1	PNCT	NTUS	$30000		0D1-6.2-D-311
FORD	80	3743	800831	C :1	3843.0	18.8	EM:1	PCRT	USED	$30000		0D1-6.2-D-311
----FORD	80	3743		1	3850.5	18.9	FE4K:	18.9	RATIO:	1.0000		
FORD	80	3743	99103	C :1	4886.0	18.0	FE:2	PNCT	USED	$14802		0S1-4.2-C-308
----FORD	80	3743		1	4888.0	18.0	FE4K:	18.8	RATIO:	1.0063		
FORD	80	3743	99188	HW:2	3778.0	20.1	EM:1	PNCT	USED	$30000		0D1-6.2-D-311
FORD	80	3743	800732	HW:2	3952.5	19.6	EM:1	PNCT	NTUS	$30000		0D1-6.2-D-311
----FORD	80	3743		2	3861.4	19.8	FE4K:	19.8	RATIO:	1.0000		
FORD	80	3743	99104	HW:2	4701.0	21.3	FE:2	PNCT	USED	$14802		0S1-4.2-C-308
----FORD	80	3743		2	4701.0	21.3	FE4K:	19.8	RATIO:	1.0732		
FORD	80	3772	98980	C :1	4188.0	18.2	EM:1	PCRT	USED	$71001		0A1-5.0-F-321
----FORD	80	3772		1	4188.0	18.2	FE4K:	18.2	RATIO:	1.0000		
FORD	80	3772	99788	C :1	4410.0	15.3	EM:1	PNCT	USED	$71004		0A1-5.0-F-321
FORD	80	3772	802261	C :1	4777.0	16.6	EM:1	PCRT	NTUS	$71004		0A1-5.0-F-321
----FORD	80	3772		1	4593.5	16.0	FE4K:	18.2	RATIO:	0.9868		
FORD	80	3772	98979	HW:2	4181.0	20.8	EM:1	PNCT	USED	$71001		0A1-5.0-F-321
----FORD	80	3772		2	4181.0	20.8	FE4K:	20.8	RATIO:	1.0000		
FORD	80	3772	99832	HW:2	4421.0	20.3	EM:1	PNCT	NTUS	$71004		0A1-5.0-F-321
FORD	80	3772	802282	HW:2	4787.7	21.3	EM:1	PNCT	USED	$71004		0A1-5.0-F-321
----FORD	80	3772		2	4804.3	20.8	FE4K:	20.8	RATIO:	0.9894		
FORD	80	3787	94827	C :1	3832.0	16.6	EM:1	PNCT	NTUS	$29900		0U2-4.9-F-338
FORD	80	3787	797810	C :1	3938.7	17.1	EM:1	PCRT	USED	$29900		0U2-4.9-F-338
----FORD	80	3787		1	3884.3	16.8	FE4K:	16.6	RATIO:	1.0000		
FORD	80	3787	95861	C :1	6052.0	17.4	FE:2	PNCT	USED	$61802		8U245
----FORD	80	3787		1	6052.0	17.4	FE4K:	16.8	RATIO:	1.0329		
FORD	80	3787	94826	HW:2	3880.0	22.6	EM:1	PNCT	USED	$29900		0U2-4.9-F-338
FORD	80	3787	797811	HW:2	3955.0	21.7	EM:1	PNCT	NTUS	$29900		0U2-4.9-F-338
----FORD	80	3787		2	3917.5	22.1	FE4K:	22.1	RATIO:	1.0000		
FORD	80	3787	95860	HW:2	7990.0	23.5	FE:2	PNCT	USED	$61802		8U245
----FORD	80	3787		2	7990.0	23.5	FE4K:	22.1	RATIO:	1.0614		
FORD	80	3793	94828	C :1	3895.0	16.2	EM:1	PNCT	NTUS	$29800		0F1-4.9-F-328
FORD	80	3793	797808	C :1	3984.1	16.2	EM:1	PCRT	USED	$29800		0F1-4.9-F-328
FORD	80	3793	98357	C :1	4173.0	15.5	EM:1	PCRT	USED	$29801		0F1-4.9-F-328
----FORD	80	3793		1	4010.7	16.0	FE4K:	16.0	RATIO:	1.0000		
FORD	80	3793	95793	C :1	6515.0	16.8	FE:2	PNCT	USED	$63801		8F258
----FORD	80	3793		1	6515.0	16.8	FE4K:	16.0	RATIO:	1.0585		
FORD	80	3793	94825	HW:2	3908.0	20.0	EM:1	PNCT	NTUS	$29800		0F1-4.9-F-328
FORD	80	3793	797809	HW:2	3988.0	19.9	EM:1	PNCT	USED	$29800		0F1-4.9-F-328
FORD	80	3793	98358	HW:2	4184.0	20.2	EM:1	PNCT	USED	$29801		0F1-4.9-F-328
----FORD	80	3793		2	4028.0	20.0	FE4K:	20.0	RATIO:	1.0000		
FORD	80	3793	95792	HW:2	6442.0	21.6	FE:2	PNCT	USED	$63801		8F258
FORD	80	3793	96070	HW:2	6557.0	20.9	FE:2	PNCT	USED	$63801		8F258
----FORD	80	3793		2	6499.5	21.2	FE4K:	20.0	RATIO:	1.0305		
FORD	80	3811	95161	C :1	3788.0	17.1	EM:1	PNCT	NTUS	$63100		0F2-4.9-C-330
FORD	80	3811	796333	C :1	3869.0	17.0	EM:1	PCRT	USED	$63100		0F2-4.9-C-330
----FORD	80	3811		1	3829.0	17.0	FE4K:	17.0	RATIO:	1.0000		
FORD	80	3811	95833	C :1	6248.0	17.4	FE:2	PNCT	USED	$71700		0F2-4.9-E-780
----FORD	80	3811		1	6249.0	17.4	FE4K:	17.0	RATIO:	1.0205		
FORD	80	3811	95182	HW:2	3780.0	23.8	EM:1	PNCT	NTUS	$63100		0F2-4.9-C-330
FORD	80	3811	796334	HW:2	3907.0	23.1	EM:1	PNCT	USED	$63100		0F2-4.9-C-330
----FORD	80	3811		2	3843.5	23.5	FE4K:	23.5	RATIO:	1.0000		
FORD	80	3811	95834	HW:2	6360.0	25.0	FE:2	PNCT	NTUS	$71700		0F2-4.9-E-780
FORD	80	3811	96269	HW:2	6348.0	23.7	FE:2	PNCT	USED	$71700		0F2-4.9-E-780
----FORD	80	3811		2	6304.5	24.3	FE4K:	23.5	RATIO:	1.0387		

MFR	ACYR	K	TNUM	TPRO	CDO	RWMG	TTYP	CTG	FRD	INT#	VRSN	VID
----FORD	80	3983		2	3842.0	17.0	FE4K: 17.0 RATIO: 1.0000					
FORD	80	3983	98858	HW:2	8432.0	17.1	FE:2 PNCT USED		583804			
----FORD	80	3983		2	8432.0	17.1	FE4K: 17.0 RATIO: 1.0058					0U1-8.8W-E-883
GM	80	4018	98814	C :1	3807.0	14.8	EM:1 PNCT USED		527800			
---- GM	80	4018		1	3807.0	14.8	FE4K: 14.8 RATIO: 1.0000					C8F173A
GM	80	4018	98871	C :1	5883.0	14.5	EM:1 PNCT USED		542700			
GM	80	4018	801188	C :1	8068.4	14.0	EM:1 PCRT NTUS		542700			C0F018
-- GM	80	4018		1	8018.7	14.2	FE4K: 14.8 RATIO: 0.8787					C0F018
GM	80	4018	98818	HW:2	3918.0	22.8	EM:1 PNCT USED		527800			
GM	80	401P	600588	HW:2	4018.8	23.1	EM:1 PNCT NTUS		527800			C8F173A
---- GM	80	4018		2	3988.4	22.8	FE4K: 22.8 RATIO: 1.0000					C8F173A
GM	80	4018	98873	HW:2	5976.0	22.7	EM:1 PNCT USED		542700			
GM	80	4018	801128	HW:2	8036.4	21.3	EM:1 PNCT NTUS		542700			C0F018
---- GM	80	4018		2	8008.2	22.0	FE4K: 22.8 RATIO: 0.9818					C0F018
GM	80	4082	98118	C :1	4222.0	18.8	EM:1 PNCT USED		580802			
---- GM	80	4082		1	4222.0	18.8	FE4K: 18.8 RATIO: 1.0000					C8N383
GM	80	4082	98881	C :1	4837.0	18.1	EM:1 PCRT USED		580802			
---- GM	80	4082		1	4837.0	18.1	FE4K: 18.8 RATIO: 0.9883					C8N383
GM	80	4082	98117	HW:2	4233.0	24.7	EM:1 PNCT USED		580802			
---- GM	80	4082		2	4233.0	24.7	FE4K: 24.7 RATIO: 1.0000					C8N383
GM	80	4082	98882	HW:2	4847.0	24.8	EM:1 PNCT USED		580803			
---- GM	80	4082		2	4847.0	24.8	FE4K: 24.7 RATIO: 1.0081					C8N383
GM	80	4182	98178	C :1	4218.0	21.1	FE:2 PNCT NTUS		583304			
---- GM	80	4182		1	4218.0	21.1	FE4K: 21.1 RATIO: 1.0000					087438
GM	80	4182	18844	C :1	5724.0	20.8	FE:2 PNCT USED		583304			
---- GM	80	4182		1	5724.0	20.8	FE4K: 21.1 RATIO: 0.9905					087438
GM	80	4182	98171	HW:2	4227.0	21.8	FE:3 PNCT NTUS		583304			
---- GM	80	4182		2	4227.0	21.8	FE4K: 21.8 RATIO: 1.0000					087438
GM	80	4182	18843	HW:2	5988.0	21.3	FE:2 PNCT USED		583304			
---- GM	80	4182		2	5988.0	21.3	FE4K: 21.8 RATIO: 0.9843					087438
GM	80	4178	98138	C :1	4142.0	18.8	EM:1 PNCT NTUS		583200			
GM	80	4178	788814	C :1	4231.8	18.9	EM:1 PCRT USED		583200			088847
---- GM	80	4178		1	4188.8	18.8	FE4K: 18.8 RATIO: 1.0000					088847
GM	80	4178	88888	C :1	4848.0	18.8	EM:1 PNCT NTUS		583202			
---- GM	80	4178		1	4848.0	18.8	FE4K: 18.8 RATIO: 0.8822					088847
GM	80	4178	98137	HW:2	4183.0	24.4	EM:1 PNCT NTUS		583200			
GM	80	4178	788818	HW:2	4242.8	24.7	EM:1 PNCT USED		583200			088847
---- GM	80	4178		2	4197.8	24.8	FE4K: 24.8 RATIO: 1.0000					088847
GM	80	4178	88888	HW:2	4888.0	25.4	EM:1 PNCT NTUS		583202			
---- GM	80	4178		2	4888.0	25.4	FE4K: 24.8 RATIO: 1.0347					088847
GM	80	4207	97888	C :1	3980.8	18.1	EM:1 PNCT NTUS		538301			
GM	80	4207	97388	C :1	4080.0	18.1	FE:2 PNCT USED		538301			888118
---- GM	80	4207		1	4038.3	18.1	FE4K: 18.1 RATIO: 1.0000					888118
GM	80	4207	98877	C :1	4838.0	17.2	EM:1 PCRT USED		538302			
-- GM	80	4207		1	4838.0	17.2	FE4K: 18.1 RATIO: 0.9503					888118
GM	80	4207	97888	HW:2	3978.0	24.8	EM:1 PNCT NTUS		538301			
GM	80	4207	97388	HW:2	4101.0	24.4	FE:2 PNCT USED		538301			888118
---- GM	80	4207		2	4038.8	24.8	FE4K: 24.8 RATIO: 1.0000					888118
GM	80	4207	98878	HW:2	4848.0	23.8	EM:1 PNCT USED		538302			
---- GM	80	4307		2	4848.0	23.8	FE4K: 24.8 RATIO: 0.9714					888118
GM	80	4223	11108	C :1	3748.0	18.8	EM:1 PNCT USED		583800			
GM	80	4223	801872	C :1	3951.3	18.2	EM:1 PCRT NTUS		583800			880183
---- GM	80	4223		1	3854.8	18.4	FE4K: 18.4 RATIO: 1.0000					880183
GM	80	4223	98388	C :1	5078.0	18.4	EM:1 PCRT NTUS		812801			
GM	80	4223	98881	C :1	5437.0	18.4	FE:2 PNCT USED		812801			888178
---- GM	80	4223		1	5258.0	18.8	FE4K: 18.4 RATIO: 1.0108					888178
GM	80	4223	11110	HW:2	3792.0	25.3	EM:1 PNCT USED		583800			
GM	80	4223	801871	HW:2	3972.1	24.4	EM:1 PNCT NTUS		583800			880183
---- GM	80	4223		2	3882.0	24.8	FE4K: 24.8 RATIO: 1.0000					880183
GM	80	4223	98388	HW:2	5080.0	25.0	EM:1 PNCT USED		812801			
GM	80	4223	98882	HW:2	5446.0	24.8	FE:2 PNCT NTUS		812801			888178
---- GM	80	4223		2	5288.0	24.8	FE4K: 24.8 RATIO: 1.0043					888178
GM	80	4234	98848	C :1	4217.0	18.1	EM:1 PNCT NTUS		583202			
---- GM	80	4234		1	4217.0	18.1	FE4K: 18.1 RATIO: 1.0000					88882
GM	80	4234	98388	C :1	5313.0	18.4	FE:2 PNCT USED		583203			
---- GM	80	4234		1	5313.0	18.4	FE4K: 18.1 RATIO: 1.0188					88882
GM	80	4234	98848	HW:2	4228.0	22.8	EM:1 PNCT USED		583202			
---- GM	80	4234		2	4228.0	22.8	FE4K: 22.8 RATIO: 1.0000					88882
GM	80	4234	98408	HW:2	5324.0	22.4	FE:2 PNCT NTUS		583202			
---- GM	80	4234		2	5324.0	22.4	FE4K: 22.8 RATIO: 0.9825					88882
GM	80	4237	98128	C :1	4018.0	17.1	EM:1 PCRT USED		583301			
---- GM	80	4237		1	4018.0	17.1	FE4K: 17.1 RATIO: 1.0000					888183
GM	80	4237	98178	C :1	5083.0	18.8	EM:1 PCRT USED		583308			
---- GM	80	4237		1	5083.0	18.8	FE4K: 17.1 RATIO: 0.8848					88882
GM	80	4237	98128	HW:2	4080.0	23.8	EM:1 PNCT USED		583301			
---- GM	80	4237		2	4080.0	23.8	FE4K: 23.8 RATIO: 1.0000					888183
GM	80	4237	98178	HW:2	5083.0	22.4	EM:1 PNCT NTUS		583308			
GM	80	4237	11100	HW:2	5587.0	23.8	EM:1 PNCT USED		583308			88882
---- GM	80	4237		2	5330.0	23.1	FE4K: 23.8 RATIO: 0.8841					88882
FIAT	80	4447	88418	C :1	3843.0	20.4	EM:1 PNCT NTUS		542700			
FIAT	80	4447	788283	C :1	4008.8	20.3	EM:1 PCRT USED		542700			0478173
----FIAT	80	4447		1	3978.4	20.3	FE4K: 20.3 RATIO: 1.0000					0478173
FIAT	80	4447	13972	C :1	4884.0	20.3	EM:1 PCRT USED		578001			
---FIAT	80	4447		1	4884.0	20.3	FE4K: 20.3 RATIO: 0.8975					0488018
FIAT	80	4447	88418	HW:2	3854.0	25.4	EM:1 PNCT NTUS		542700			
FIAT	80	4447	788382	HW:2	4036.7	24.4	EM:1 PNCT USED		542700			0478173
----FIAT	80	4447		2	3991.3	24.9	FE4K: 24.8 RATIO: 1.0000					0478173
FIAT	80	4447	13973	HW:2	4788.0	25.8	FE:2 PNCT USED		578001			0488018

MFR	ACYR	K	TNUM	TPRG	SSN	RUNG	TYP	CTR	N	VID
CHRY	81	4931	804962	C :1	7648.0	28.2	FE:2	PNCT USED 732001		D180
----CHRY	81	4931		1	7850.5	28.5	FE4K: 28.6	RATIO: 1.0240		
CHRY	81	4931	18897	HW:2	3830.0	41.2	EM:1	PNCT NTUS 888800		D188
CHRY	81	4931	802268	HW:2	3917.6	38.4	EM:1	PNCT USED 888800		D188
----CHRY	81	4931		2	3873.8	40.3	FE4K: 40.3	RATIO: 1.0000		
CHRY	81	4931	18188	HW:2	7488.0	42.8	FE:2	PNCT NTUS 732001		D180
CHRY	81	4931	804837	HW:2	7815.0	41.5	FE:2	PNCT USED 732001		D180
---CHRY	81	4931		2	7840.5	42.1	FE4K: 40.2	RATIO: 1.0482		
CHRY	81	4948	13215	C :1	3713.0	31.8	EM:1	PNCT NTUS 888100		D181
CHRY	81	4948	802260	C :1	3848.0	32.8	EM:1	PCRT USED 888100		D181
CHRY	81	4948	18281	C :1	4127.0	33.2	EM:1	PNCT NTUS 888100		D181
CHRY	81	4948	18283	C :1	4183.0	32.1	EM:1	PCRT USED 888103		D181
----CHRY	81	4948		1	3988.8	33.8	FE4K: 33.8	RATIO: 1.0000		
CHRY	81	4948	18888	C :1	4230.0	33.1	EM:1	PNCT USED 888101		D181
----CHRY	81	4948		1	4230.0	33.1	FE4K: 33.8	RATIO: 1.0281		
CHRY	81	4948	18988	C :1	4388.0	33.8	EM:1	PCRT USED 888102		D181
----CHRY	81	4948		1	4388.0	33.8	FE4K: 33.8	RATIO: 1.0872		
CHRY	81	4948	17883	C :1	4472.0	33.9	EM:1	PCRT NTUS 888101		D181
----CHRY	81	4948		1	4472.0	33.8	FE4K: 33.8	RATIO: 1.0817		
CHRY	81	4948	13218	HW:2	3736.0	30.8	EM:1	PNCT NTUS 888100		D181
CHRY	81	4948	802212	HW:2	3780.0	30.8	EM:1	PNCT USED 888100		D181
CHRY	81	4948	802260	HW:2	3886.0	30.4	EM:1	PNCT NTUS 888100		D181
CHRY	81	4948	18887	HW:2	4183.0	30.2	EM:1	PNCT USED 888103		D181
----CHRY	81	4948		2	3883.8	30.4	FE4K: 30.4	RATIO: 1.0000		
CHRY	81	4948	18888	HW:2	4341.0	31.8	EM:1	PNCT USED 888101		D181
----CHRY	81	4948		2	4341.0	31.8	FE4K: 30.4	RATIO: 1.0444		
CHRY	81	4948	18887	HW:2	4378.0	31.3	EM:1	PNCT USED 888103		D181
----CHRY	81	4948		2	4378.0	31.3	FE4K: 30.4	RATIO: 1.0279		
CHRY	81	4948	17884	HW:2	4484.0	33.8	EM:1	PNCT NTUS 888101		D181
----CHRY	81	4948		2	4484.0	33.8	FE4K: 30.4	RATIO: 1.1035		
FORD	81	5034	18412	C :1	3976.0	27.8	EM:1	PNCT NTUS 728000		1E2-1.8-P-441
FORD	81	5034	804886	C :1	4048.4	27.3	EM:1	PCRT USED 728000		1E2-1.8-P-441
----FORD	81	5034		1	4028.7	27.8	FE4K: 27.8	RATIO: 1.0000		
FORD	81	5034	20408	C :1	4408.0	28.7	FE:2	PNCT NTUS 728001		1E2-1.8-P-441
FORD	81	5034	805348	C :1	4813.7	27.8	FE:2	PNCT USED 728001		1E2-1.8-P-441
----FORD	81	5034		1	4480.8	28.3	FE4K: 27.8	RATIO: 1.0383		
FORD	81	5034	18413	HW:2	3886.0	44.8	EM:1	PNCT NTUS 728000		1E2-1.8-P-441
FORD	81	5034	804887	HW:2	4115.4	44.0	EM:1	PNCT USED 728000		1E2-1.8-P-441
----FORD	81	5034		2	4050.7	44.4	FE4K: 44.4	RATIO: 1.0000		
FORD	81	5034	20408	HW:2	4421.0	44.0	FE:2	PNCT NTUS 728001		1E2-1.8-P-441
FORD	81	5034	805349	HW:2	4823.7	44.4	FE:2	PNCT USED 728001		1E2-1.8-P-441
----FORD	81	5034		2	4472.3	44.2	FE4K: 44.4	RATIO: 0.9945		
FORD	81	5049	22844	C :1	4201.0	31.5	FE:2	PNCT NTUS 749801		1Z1-2.3-P-272
FORD	81	5049	807066	C :1	4233.0	30.0	FE:2	PNCT USED 749801		1Z1-2.3-P-272
----FORD	81	5049		1	4217.0	30.7	FE4K: 30.7	RATIO: 1.0000		
FORD	81	5049	22837	C :1	5883.0	21.5	FE:2	PNCT NTUS 778800		1Z1-2.3-N-274
FORD	81	5049	806851	C :1	5878.0	20.2	FE:2	PNCT USED 778800		1Z1-2.3-N-274
---FORD	81	5049		1	5834.0	20.8	FE4K: 30.7	RATIO: 1.0052		
FORD	81	5049	22845	HW:2	4230.0	31.9	FE:2	PNCT NTUS 749801		1Z1-2.3-P-272
FORD	81	5049	807068	HW:2	4241.4	31.3	FE:2	PNCT USED 749801		1Z1-2.3-P-272
----FORD	81	5049		2	4230.7	31.8	FE4K: 31.8	RATIO: 1.0000		
FORD	81	5049	22838	HW:2	5710.0	32.8	FE:2	PNCT NTUS 778800		1Z1-2.3-N-274
FORD	81	5049	806862	HW:2	5881.2	31.1	FE:2	PNCT USED 778800		1Z1-2.3-N-274
----FORD	81	5049		2	5880.6	31.8	FE4K: 31.8	RATIO: 1.0074		
FORD	81	5051	19888	C :1	3938.0	20.4	EM:1	PCRT NTUS 749800		1Z1-2.3-P-272
FORD	81	5051	805880	C :1	4095.8	20.2	EM:1	PNCT USED 749800		1Z1-2.3-P-272
----FORD	81	5051		1	4018.3	20.3	FE4K: 30.3	RATIO: 1.0000		
FORD	81	5051	23031	C :1	5885.0	21.0	FE:2	PNCT USED 778802		1Z1-2.3-N-274
----FORD	81	5051		1	5885.0	21.0	FE4K: 30.3	RATIO: 1.0348		
FORD	81	5051	19832	HW:2	3903.0	29.3	EM:1	PNCT NTUS 749800		1Z1-2.3-P-272
FORD	81	5051	805356	HW:2	4057.0	30.9	EM:1	PNCT USED 749800		1Z1-2.3-P-272
----FORD	81	5051		2	3980.0	30.1	FE4K: 30.1	RATIO: 1.0000		
FORD	81	5051	23032	HW:2	5886.0	31.5	FE:2	PNCT USED 778802		1Z1-2.3-N-274
----FORD	81	5051		2	5886.0	31.5	FE4K: 30.1	RATIO: 1.0473		
FORD	81	5107	18830	C :1	3807.0	15.2	EM:1	PNCT NTUS 710400		1F1-5.0-P-838
FORD	81	5107	18284	C :1	3872.0	14.4	EM:1	PCRT USED 710400		1F1-5.0-P-838
----FORD	81	5107		1	3838.5	14.8	FE4K: 14.8	RATIO: 1.0000		
FORD	81	5107	18888	C :1	5885.0	15.2	FE:2	PNCT USED 735100		1F1-5.0-N-810
FORD	81	5107	18838	C :1	5952.0	14.2	FE:2	PNCT NTUS 735100		1F1-5.0-N-810
----FORD	81	5107		1	5878.5	14.7	FE4K: 14.8	RATIO: 0.9926		
FORD	81	5107	18831	HW:2	3838.0	15.8	EM:1	PNCT NTUS 710400		1F1-5.0-P-838
FORD	81	5107	18285	HW:2	3886.0	16.0	EM:1	PNCT USED 710400		1F1-5.0-P-838
----FORD	81	5107		2	3885.0	16.3	FE4K: 16.3	RATIO: 1.0000		
FORD	81	5107	18888	HW:2	5818.0	15.1	FE:2	PNCT USED 735100		1F1-5.0-N-810
FORD	81	5107	18836	HW:2	5922.0	15.4	FE:2	PNCT NTUS 735100		1F1-5.0-N-810
----FORD	81	5107		2	5870.0	15.2	FE4K: 16.3	RATIO: 1.0521		
FORD	81	5188	18245	C :1	3848.0	17.8	EM:1	PNCT NTUS 875400		1U2-4.8-P-888
FORD	81	5188	18283	C :1	4087.0	17.8	EM:1	PNCT NTUS 875400		1U2-4.8-P-888
FORD	81	5188	803387	C :1	4184.0	17.2	EM:1	PCRT USED 875400		1U2-4.8-P-888
----FORD	81	5188		1	4030.0	17.4	FE4K: 17.4	RATIO: 1.0000		
FORD	81	5188	18882	C :1	5888.0	17.8	FE:2	PNCT USED 730802		1U2-4.8-N-847
----FORD	81	5188		1	5888.0	17.8	FE4K: 17.4	RATIO: 1.0288		
FORD	81	5188	18284	HW:2	4087.0	23.1	EM:1	PNCT NTUS 875400		1U2-4.8-P-888
FORD	81	5188	803388	HW:2	4203.0	22.7	EM:1	PNCT USED 875400		1U2-4.8-P-888
----FORD	81	5188		2	4145.0	22.8	FE4K: 22.8	RATIO: 1.0000		
FORD	81	5188	18883	HW:2	5870.0	23.3	FE:2	PNCT USED 730802		1U2-4.8-N-847
---FORD	81	5188		2	5870.0	23.3	FE4K: 22.8	RATIO: 1.0175		
FORD	81	5192	13487	C :1	3887.0	14.7	EM:1	PNCT NTUS 878700		1U1-4.8-P-104
FORD	81	5192	802406	C :1	3868.1	15.2	EM:1	PCRT USED 878700		1U1-4.8-P-104
----FORD	81	5192		1	3907.5	14.8	FE4K: 14.8	RATIO: 1.0000		
FORD	81	5192	17887	C :1	5810.0	15.8	FE:2	PNCT USED 735800		1U1-4.8-N-834
----FORD	81	5192		1	5810.0	15.8	FE4K: 14.8	RATIO: 1.0872		

MFR	ACYR	K	TNUM	TYPE	OBS	RMNS	TTYP	CYD	FED	INT#	VRSN	VID
GM	81	8411	20279	HW:2	7776.0	27.3	FE:2	PNCT	USED	788100		14E4-80785F
---- GM	81	8411		2	7782.0	27.3	FE4K:	27.0	RATIO:	1.0088		
GM	81	8415	803888	C :1	3978.0	18.0	SM:1	PCRT	USED	898400	880131	
---- GM	81	8415		1	3978.0	18.0	FE4K:	18.0	RATIO:	1.0000		
GM	81	8415	20080	C :1	4732.0	18.4	FE:2	PNCT	USED	898403	880131	
---- GM	81	8415		1	4733.0	18.4	FE4K:	18.0	RATIO:	1.0222		
GM	81	8415	20082	C :1	7825.0	19.2	FE:2	PNCT	NTUS	785200	14F4-80823F	
GM	81	8415	808431	C :1	7820.3	19.0	FE:2	PNCT	USED	785200	14F4-80823F	
--- GM	81	8415		1	7772.5	19.1	FE4K:	18.0	RATIO:	1.0611		
GM	81	8415	15700	HW:2	3844.0	23.8	SM:1	PNCT	NTUS	898400	880131	
GM	81	8415	802881	HW:2	3988.8	23.8	SM:1	PNCT	USED	898400	880131	
---- GM	81	8415		2	3828.4	23.8	FE4K:	23.8	RATIO:	1.0000		
GM	81	8415	20081	HW:2	4742.0	25.1	FE:2	PNCT	USED	898403	880131	
---- GM	81	8415		2	4743.0	25.1	FE4K:	23.8	RATIO:	1.0536		
GM	81	8415	20083	HW:2	7826.0	27.8	FE:2	PNCT	NTUS	785200	14F4-80823F	
GM	81	8415	808430	HW:2	7931.1	27.8	FE:2	PNCT	USED	785200	14F4-80823F	
---- GM	81	8415		2	7763.8	27.7	FE4K:	23.8	RATIO:	1.1737		
GM	81	8417	18813	C :1	3752.0	17.2	SM:1	PNCT	NTUS	711700	880116	
GM	81	8417	803900	C :1	3830.0	17.4	SM:1	PCRT	USED	711700	880116	
GM	81	8417	18842	C :1	4008.0	17.5	FE:2	PNCT	NTUS	711700	880116	
---- GM	81	8417		1	3935.7	17.4	FE4K:	17.4	RATIO:	1.0000		
GM	81	8417	20208	C :1	7848.0	18.1	FE:2	PNCT	USED	758200	14F4-801158F	
---- GM	81	8417		1	7848.0	18.1	FE4K:	17.4	RATIO:	1.0422		
GM	81	8417	18816	HW:2	3783.0	28.4	SM:1	PNCT	NTUS	711700	880116	
GM	81	8417	803836	HW:2	3884.8	28.7	SM:1	PNCT	USED	711700	880116	
GM	81	8417	18843	HW:2	4108.0	28.7	FE:2	PNCT	NTUS	711700	880116	
---- GM	81	8417		2	3954.5	28.6	FE4K:	28.6	RATIO:	1.0000		
GM	81	8417	20207	HW:2	7856.0	28.6	FE:2	PNCT	USED	758200	14F4-801158F	
---- GM	81	8417		2	7856.0	28.6	FE4K:	28.6	RATIO:	1.0389		
GM	81	8418	17784	C :1	3826.0	17.0	SM:1	PNCT	NTUS	724100	880101	
GM	81	8418	18435	C :1	4074.0	17.1	SM:1	PCRT	USED	724100	880101	
GM	81	8418	20152	C :1	4110.0	17.8	FE:2	PNCT	USED	728001	880103	
GM	81	8418	20184	C :1	4184.0	17.7	FE:2	PNCT	USED	728001	880103	
---- GM	81	8418		1	4085.5	17.4	FE4K:	17.4	RATIO:	1.0000		
GM	81	8418	20208	C :1	7842.0	17.4	FE:2	PNCT	USED	758300	14F4-80845F	
GM	81	8418	20210	C :1	7688.0	17.8	FE:2	PNCT	USED	758300	14F4-80845F	
GM	81	8418	20212	C :1	7731.0	17.8	FE:2	PNCT	USED	758300	14F4-80845F	
---- GM	81	8418		1	7688.3	17.8	FE4K:	17.4	RATIO:	1.0118		
GM	81	8418	17783	HW:2	3835.0	23.6	SM:1	PNCT	NTUS	724100	880101	
GM	81	8418	18438	HW:2	4085.0	23.6	SM:1	PNCT	USED	724100	880101	
GM	81	8418	20183	HW:2	4121.0	24.1	FE:2	PNCT	USED	728001	880103	
GM	81	8418	20186	HW:2	4185.0	24.4	FE:2	PNCT	USED	728001	880103	
---- GM	81	8418		2	4081.5	23.8	FE4K:	23.8	RATIO:	1.0000		
GM	81	8418	20211	HW:2	7897.0	24.7	FE:2	PNCT	USED	758300	14F4-80845F	
---- GM	81	8418		2	7897.0	24.7	FE4K:	23.8	RATIO:	1.0328		
GM	81	8420	17844	C :1	3830.0	18.6	SM:1	PNCT	NTUS	720900	880117	
GM	81	8420	803781	C :1	4022.0	18.6	SM:1	PCRT	USED	720900	880117	
---- GM	81	8420		1	3926.0	18.7	FE4K:	18.7	RATIO:	1.0000		
GM	81	8420	20219	C :1	8060.0	17.0	FE:2	PNCT	USED	758201	14F4-801159F	
---- GM	81	8420		1	8060.0	17.0	FE4K:	16.7	RATIO:	1.0180		
GM	81	8420	17845	HW:2	3841.0	25.6	SM:1	PNCT	NTUS	720900	880117	
GM	81	8420	802788	HW:2	4023.7	25.2	SM:1	PNCT	USED	720900	880117	
---- GM	81	8420		2	3937.3	25.4	FE4K:	25.4	RATIO:	1.0000		
GM	81	8420	20220	HW:2	8081.0	27.2	FE:2	PNCT	NTUS	758201	14F4-801159F	
GM	81	8420	20527	HW:2	8188.0	27.3	FE:2	PNCT	USED	758201	14F4-801159F	
---- GM	81	8420		2	8139.5	27.2	FE4K:	25.4	RATIO:	1.0729		

COUNTS(4K): CITY.EMISS = 93 HW.EMISS = 93 CITY.FE = 28 HW.FE = 29
COUNTS(+K): CITY.EMISS = 30 HW.EMISS = 30 CITY.FE = 99 HW.FE = 99